



GOOD FIRE

Current Barriers to the Expansion of Cultural Burning and Prescribed Fire in California and Recommended Solutions

> BY: SARA A. CLARK, ANDREW MILLER, AND DON L. HANKINS FOR THE KARUK TRIBE

ABOUT THE AUTHORS

SARA A. CLARK is a partner at Shute, Mihaly & Weinberger LLP, a public interest law firm representing nonprofit organizations, government entities, and Tribes on environmental, natural resource, and governmental issues. Ms. Clark's practice focuses on advocating for protection of cultural and natural resources important to Tribes, ensuring adequate environmental review of decisions affecting the lives of all Californians, and facilitating the permanent protection of landscapes for natural resources, agriculture, open space, and public recreation. She serves on the Board of Directors of the Save the Redwoods League.

ANDREW MILLER is a fellow at Shute, Mihaly & Weinberger LLP. Mr. Miller's practice focuses on increasing public access to natural resources, open space, and recreation areas, as well as promoting environmentally sound decision making at the state and local level.

DON HANKINS is a professor of Geography and Planning at CSU Chico and Field Director for the CSU Chico Ecological Reserves. He is a Miwko? traditional cultural practitioner. His areas of expertise include pyrogeography, water resources, conservation, and Indigenous land and water stewardship. His research includes wildland fire with an emphasis on landscape scale, cultural and prescribed fires, and the implications of these fires to biodiversity conservation and environmental change. His professional experience includes various aspects of land management, regulation, policy, and conservation with a variety of organizations and agencies including Indigenous entities in North America and Australia.

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INTRODUCTION

n 2020, over four percent of California burned in wildfire. Over 30 people lost their lives in the fires; experts estimate an additional 3,000 premature deaths may have resulted from wildfire smoke. Property damage is expected to top \$10 billion. And greenhouse gas emissions from the fires wiped out all of California's efforts to curtail such pollution. Local, state, federal, and tribal governments are looking for ways to manage these impacts as climate change makes fire season longer and fire behavior more extreme.

Cultural burning and prescribed fire are essential tools in managing these impacts, restoring California's fireadapted ecosystems, and repairing the fraught relationship between California, its Indigenous peoples, and stewardship of the landscape. Numerous studies have shown that use of prescribed fire reduces the scope and intensity of future wildfires. Moreover, the cyclical application of fire is a necessary condition for many of California's ecosystems, enabling wildlife habitat improvements and effective watershed and vegetation management. Current estimates indicate that between 10 to 30 million acres in California would benefit from both initial and ongoing fuel reduction treatment, including prescribed fire.¹

The concomitant effects of removal of Indigenous fire practices from California's ecosystems has become increasingly self-evident in the extent and magnitude of recent wildfires. Indigenous peoples used fire to shape vegetation in the landscape to create more fire resistant ecosystems and mitigate the impacts from wildfires and climate variability. While the continuity of cultural burning following European and American colonization has been limited at best, the practical knowledge of burning has been maintained among some practitioners through applied burning, or recounted in the stories from prior generations.

Several key impediments to implementing both prescribed fire and cultural burning today exist. For all burns, regulatory attempts to mitigate or completely avoid the risks of intentional fire—including smoke and potential escape—have significantly impeded its use. Likewise, concerns about liability and availability of insurance have limited burn size and activity. Public agencies—like CAL FIRE and the U.S. Forest Service—have had to wrestle with reorienting agency culture, staff, and resources away

1 M. Burke et al., "Managing the growing cost of wildfire" Stanford Institute for Economic Policy Research, Policy Brief (October 2020).

from fire suppression at toward intentional fire, during the worst fire seasons in modern history. Many individuals and agencies have begun making progress on these complex issues, but change is not happening fast enough to fundamentally increase the scope of prescribed fire implementation.

The barriers to cultural burning are even more significant. including recognition of tribal rights and skills, land access, and funding. While there is common knowledge of the use of fire by Indigenous peoples, the ability to utilize cultural burning is largely curtailed by state and federal policies rooted in paternalistic governance and the legacies of racism, which conflict with traditional law and cultural practices for burning. Central to this issue is the lack of recognition of sovereignty and self-determination. Cultural obligations to uphold stewardship responsibilities across ancestral territories, including burning, have not been surrendered. California, however, lacks ratified treaties with Tribes and lacks any formal recognition of Native Title. As such, access to sites to engage in stewardship is often difficult to navigate among the diverse public and private land tenures currently recognized by state and federal law. Similarly, conflicting legal frameworks between traditional law and the laws of local, state, federal, and even some Tribes create confusion surrounding the ability to burn, even where the basic tenets of self-determination are recognized within federal and state law. The issue spans beyond fundamental differences between traditional law and colonial laws, but includes unclear or conflicting language within colonial law itself. This situation makes the presence of Indigenous people within the bureaucracy essential in order for change to happen from within.

Traditional law and Indigenous knowledge recognize the need to burn to minimize wildfires and impacts thereof. Fire is/was part of routine social activity; people set fires personally, or engage in burning with others to achieve outcomes for the greater good of those involved (e.g., hunting, cleaning up the land, etc.). While such instances are rare in California, one can see the spectrum of this in burning carried out in remote Aboriginal communities of Australia, where the time-tested use of fire is still part of daily life. Here, navigating the differences of policy can be difficult, but in the context of Traditional law, fire is the law of the land, and cultural practitioners are the conduit for upholding the law.

Indigenous cultural burning practices are distinguished from other fire management (e.g., local, state and federal agency) in the context of traditional law, objectives, outcomes and the right to burn.² Traditional law and lore are rooted in the landscape and stories that define a given culture,³ and thus fire is law. In this context, each member of an Indigenous society has some connection to fire. From the first fire story, which many Indigenous societies recount, it is an inevitable process of life. It has been handed down as a responsibility through generations, with forebears mindful of their progeny in generations to come.

Since landscapes are dynamic in relationship to environmental and cultural processes, the law itself is dynamic to guide implementation of burning in space and time. A cultural practitioner understands the encoding of such knowledge in the stories of their country or more broadly across a region. The intimate familiarity of the environment enables the reading of the landscape to convey its need for burning based on factors such as plant phenology, the accumulation of dead plant materials or the decline in resource conditions, soil moisture, seasonal weather patterns and other factors. Similarly, the stories convey the penalties for not following the laws of the land. Naturally such penalties might be the devastation caused by the fire itself, but could include restitution for damage to resources or property, and in some instances the most severe penalties might be applied. However, there is also the reality that without cultural fire and a willingness to burn, wildfires will occur, and that is a consequence of not burning. To recognize that fire is the law of the land is to recognize that it is part of the laws of nature.

To begin to address these complex and interrelated issues, this paper takes a "barriers and solutions" approach. Identified barriers are arranged by topic area, with background information on the legal and policy frameworks⁴ that have directly or indirectly created these barriers. Specific barriers are identified and described. Finally, the paper identifies possible solutions to address these barriers, ranging from internal agency changes to significant amendments to state and federal statute.

² Eriksen, C.E. and D.L. Hankins, The Retention, Revival and Subjugation of Indigenous Fire Knowledge through Agency Fire Fighting in Eastern Australia and California, USA. Society and Natural Resources (2014).

³ Black, C.F., The Land is the Source of the Law: A Dialogic Encounter with Indigenous Jurisprudence. London: Routledge (2011).

⁴ As noted by Schultz, "the term "policy" encompasses a variety of actions taken (or not taken) but government, and changing policy is a complex process." Therefore, this paper attempts to "distinguish between policy barriers that are 1) fixed in congressional laws, 2) a result of state or federal agency policy interpretations (e.g., regulations and agency guidance), 3) a result of agency culture or habit, and 4) a result of individual decisionmaking at the field level." C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).

Accordingly, these solutions range greatly in both their efficacy in reducing barriers and their likelihood of implementation.

A NOTE ON TERMINOLOGY

Cultural burns and prescribed fire: Existing state and federal frameworks generally treat cultural burning as a subset of prescribed fire. Both the act of setting fire to a specific landscape to achieve a desired outcome, including fuel reduction and wildlife habitat improvement. However, cultural burning and prescribed fire are distinct concepts and are often conducted by different groups for different purposes. Prescribed fire is implemented based on a 'prescription' derived from models to determine conditions for burning. Especially when state agencies are involved, prescribed fire typically includes the production of a burn plan, smoke management plan, and completion of environmental impact analysis.⁵

Cultural burning is typically less formal, and is integrative of holistic knowledge of place to guide the timing and implementation of burning activities. Cultural burning implies the purposeful use of fire by a cultural group (e.g., family unit, Tribe, clan/moiety, society) for a variety of purposes and outcomes. The reasons for cultural burning can be quite extensive and range from maintenance of travel corridors, wildlife habitat improvement, attracting wildlife to a place, water stewardship, pest control, stewardship of cultural plants, conservation/protection, and even spiritual reasons. While it could be argued that any anthropogenic burn could be deemed "cultural," cultural practitioners maintain that there is a difference between the terms prescribed fire and cultural burn.⁶ For brevity, this paper refers to both prescribed fire and cultural burning as "intentional fire" or "intentional burning" and then differentiates between cultural burning and prescribed fire as necessary to describe unique issues or recommendations.

Tribes and cultural fire practitioners: Cultural burns may be conducted by a diverse array of organizations and individuals. Complexity results from the varying treatment of Tribes and Indigenous people under existing state and federal law. For purposes of this paper, the term "Tribe" refers to a California Native American Tribe or California Indian Tribe as defined under state law.⁷ This term captures more tribal entities than recognized under federal law, but does not include all Tribes or tribal entities in California. Where relevant, this paper also refers to federally recognized Tribes, which are eligible for unique treatment under federal law.

For purposes of this paper, the term "cultural fire practitioner" refers to any individual engaged in the practice of cultural burning.8 Such individuals may or may not be members of Tribes, or may be organized as nonprofit organizations such as the Cultural Fire Management Council or the Amah Mutsun Land Trust. Such individuals may identify as Native American, Indian, or Indigenous. In contrast, other individuals engaged in the use of prescribed fire are referred to in this paper as "burners."

⁵ The Public Resources Code defines "prescribed burning" as "the planned application and confinement of fire to wild land fuels on lands selected in advance of that application to achieve any of the following objectives: (1) Prevention of high-intensity wild land fires through reduction of the volume and continuity of wild land fuels; (2) Watershed management; (3) Range improvement; (4) Vegetation management; (5) Forest improvement; (6) Wildlife habitat improvement; (7) Air quality maintenance." Pub. Resources Code §§ 4462(e); 4475.

⁶ Cultural burns may also be called traditional fire (Yibarbuk, D., et al., Fire Ecology and Aboriginal Land Management in Central Arnhem Land, Northern Australia: A Tradition of Ecosystem Management. *Journal of Biogeography*. 28:325-343 (2001)), traditional burning, and Indigenous prescribed fire (Hankins, D.L., The Effects of Indigenous Prescribed Fire on Herpetofauna and Small Mammals in Central California Riparian Ecosystems. *California Geographer*. 2009(49):31-50 (2009); Hankins, D.L., The effects of indigenous prescribed fire use in Australian tropical savannas: Ecological effects and management lessons. In Tropical fire ecology: Climate change, land use, and ecosystem dynamics, ed. M. A. Cochrane, 113–141. Berlin, Germany: Springer (2009)), traditional use of fire (Rodríguez-Trejo, D.A., et al. The Present Status of Fire Ecology, Traditional Use of Fire, and Fire Management in Mexico and Central America. *Fire Ecology* 7, 40–56 (2011)), and Indigenous fire ecology (Fowler, C., Ignition Stories: Indigenous Fire Ecology in the Indo-Australian Monsoon Zone. Carolina Academic Press, Durham, North Carolina, USA (2013)).

⁷ The Native American Heritage Commission maintains a list of all California Native American Tribes/California Indian Tribes recognized under state law. See, e.g., Health & Saf. Code § 8012(c); Pub. Resources Code § 21073.

⁸ As discussed below, a potential legal definition of a cultural fire practitioner could be: "A Native American person engaged in burning to meet cultural goals or objectives, including the enhancement of culturally important resources, or a California Native American Tribe."



ISSUES SPECIFIC TO TRIBES

n an effort to frame the recommendations within this paper, we begin with a discussion of the issues that are unique to the experiences and challenges for Tribes and cultural fire practitioners. Many of the challenges faced by this group are not wholly unique, but additional complexities render their situations uniquely challenging. By starting with this foundation, readers will be better able to understand how individual barriers—when layered with tribal sovereignty, disparate treatment of tribal groups, and land tenures that reflect centuries of genocide, removal, broken promises, and forced assimilation—become all the more urgent to overcome.

To begin, Tribes and Native Americans have retained sovereignty over their affairs. The degree of sovereignty depends on the activity in question, the location, and the participants, as well as who you ask.⁹ Disagreements over retained sovereignty have defined the complex relationship between the United States, individual states, Tribes, and Native Americans. Sovereignty over lands, waters, and natural resources within their unique ancestral territories is one of the most critical retained powers for Tribes. Indeed, Tribes throughout California have codified and exercised such authority through their tribal constitutions.¹⁰ The Karuk Tribe, for instance, expressly reserves authority over "[a] Il lands, waters, natural resources, cultural resources, air

⁹ Compare, e.g., Karuk Tribal Const., art. II, § 5 ("The laws of the Karuk Tribe shall extend to ... [a]II lands, waters, natural resources, cultural resources, air space, minerals, fish, forests and other flora, wildlife, and other resources, and any interest therein, now or in the future, throughout and within the Tribes' territory.") with Michigan v. Bay Mills Indian Community (2014) 572 U.S. 782, 788 ("Indian tribes are " 'domestic dependent nations' " that exercise "inherent sovereign authority." Oklahoma Tax Comm'n v. Citizen Band Potawatomi Tribe of Okla., 498 U.S. 505, 509 [] (1991) (Potawatomi) (quoting Cherokee Nation v. Georgia, 5 Pet. 1 [] (1831)]. As dependents, the tribes are subject to plenary control by Congress. See United States v. Lara, 541 U.S. 193, 200 [] (2004) ("[T]he Constitution grants Congress" powers "we have consistently described as 'plenary and exclusive' " to "legislate in respect to Indian tribes"). And yet they remain "separate sovereigns pre-existing the Constitution." Santa Clara Pueblo v. Martinez, 436 U.S. 49, 56 [] (1978). Thus, unless and "until Congress acts, the tribes retain" their historic sovereign authority. United States v. Wheeler 435 U.S. 313, 323 [] (1978).").

¹⁰ *E.g.*, Karuk Tribal Const., art. II, § 5; Yurok Tribal Const., art. I, § 3 (exercising jurisdiction over "all lands, waters, river beds, submerged lands, properties, air space, minerals, fish, forests, wildlife, and other resources" within the Tribe's territory).

space, minerals, fish, forests and other flora, wildlife, and other resources, and any interest therein, now or in the future, throughout and within the Tribes' territory."¹¹ Tribes practice place-based cultures, and many believe they have a responsibility to steward those places, including using fire to balance natural resources for the benefit of the natural world.

Nevertheless, both federal and state governments can and do interfere with the exercise of such sovereignty. Congress retains plenary and exclusive authority over Indian affairs.¹² Through this power, they have exercised extensive authority over tribal control of forest management, both in Indian Country—i.e., lands within Tribal reservations, dependent Indian communities, and Indian allotments¹³—and on lands now in public ownership.¹⁴

Within Indian Country, Tribes are generally afforded the right to manage their resources free from state regulation and interference.¹⁵ Even in states where Congress has permitted state exercise of criminal jurisdiction in Indian Country¹⁶—such as California—the U.S. Supreme Court has curtailed the exercise of state civil jurisdiction. Generally, so long as state laws are "regulatory" in nature rather than "prohibitory," states cannot impose them on Indians within Indian Country.¹⁷

Notably, however, Tribes frequently assert jurisdiction over natural resources located throughout their ancestral territories, which are often significantly larger than lands officially recognized as Indian Country. Formal title to such lands may now be carried by the federal government, the state, or other non-Native American owners. And even within Indian Country, states can exercise significant control over non-Indians. Consequently, state jurisdiction over intentional fire can still play a significant role in for cultural fire practitioners, who may be burning outside of Indian Country or in tandem with non-Indian partners. Nevertheless, to the extent that Tribes, tribal members, and Native Americans retain and can exercise such sovereignty, it permits them the opportunity to practice and implement the laws of the natural world. The use of cultural burning is a critical part of that natural law. As articulated by Don Hankins:

.....

Fire is codified in the law of the land, and it has been so since time immemorial; it has always been here and always will be. ... To recognize that fire is the law of the land is to recognize that it is part of the laws of nature. ... Indigenous fire knowledge encompasses a complex understanding of the environment and reading of a landscape's needs and indicators for when, where, and what type of fire should be used to achieve desired outcomes for the land.¹⁸

By recognizing the inherent authority of Tribes, tribal organizations, and cultural fire practitioners to engage in the use of cultural fire, we can start to return the landscape to a condition in which the laws of nature are recognized and respected.

BARRIER: State agencies do not understand or respect tribal sovereignty.

Retaining sovereignty, jurisdiction, and control over natural resources within ancestral territories means that Tribes and cultural fire practitioners should have authority to determine when, where, and how to apply cultural burns to these lands. Instead, state agencies typically assert that Tribes and cultural fire practitioners must obtain the exact same permits and approvals as non-native burners, except for Tribes and Indians burning on lands formally recognized as Indian Country. These can include burn permits from CAL FIRE, smoke permits from air districts, and California Environmental Quality Act clearance for grants or other state funding. Some Tribes and cultural fire practitioners have balked at this interference in their exercise of inherent sovereignty and refused to obtain permits for

12 United States v. Lara (2004) 541 U.S. 193, 200.

¹¹ Karuk Tribal Const., art. II, § 5.

^{13 18} U.S.C. § 1151(c).

¹⁴ See, e.g., National Indian Forest Resource Management Act, 25 U.S.C. § 3101-20; Tribal Forest Protection Act, 25 U.S.C. § 3115a; BIA's Reserved Treaty Lands Rights program. The Indian Self-Determination and Education Assistance Act (25 U.S.C. § 450e-1, 450f) and the Tribal Self-Governance Act (25 U.S.C. § 458cc) also regulate the extent to which Tribes may assume primary management authority over forestry programs.

¹⁵ Okla Tax. Com. v. Sac & Fox Nation (1993) 508 U.S. 114, 125; Shivwits Band of Paiute Indians v. Utah (10th Cir. 2005) 428 F.3d 966; Wash. Dept. of Ecology v. EPA (9th Cir. 1985) 752 F.2d 1465, 1469-71 (even for cooperative federalism, state primacy over Indian Country would be inconsistent with federal policy of promoting tribal self-determination).

¹⁶ See, e.g., 18 U.S.C. § 1162(a); 25 U.S.C. §§ 1321(a), 1322(a); 28 U.S.C. §1360(a). Such states are generally referred to as "Public Law 280" states.

¹⁷ California v. Cabazon Band of Mission Indians (1987) 480 U.S. 202, 210.

¹⁸ D. Hankins, "Reading the Landscape for Fire" Bay Nature (January 2020).

their burns, potentially exposing themselves to the threat of fines or criminal charges.¹⁹ The lack of recognition of tribal authority by the state in this area has also meant that Tribes and cultural fire practitioners who do not obtain CAL FIRE permits do not benefit from the more relaxed liability standard afforded in Section 4494(b) of the Public Resources Code, as discussed further below.

Questions about sovereign immunity also impede tribal participation in state programs. Sovereign immunity is an inherent aspect of sovereignty, which Tribes have retained as a matter of both tribal and federal law. It provides Tribes and the officers with protection against liability, unless specifically abrogated by the Tribe or by Congress.²⁰ Burners report that state agencies often require Tribes to waive their sovereign immunity before accepting funding or entering into contracting agreements to implement intentional burns.

A related issue arises with respect to certification for burners. The state is currently rolling out a state-certified burn boss program in accordance with Section 4477 of the Public Resources Code. Likewise, other CAL FIRE permits or grant programs often require specific firefighting certifications for burn leadership positions. These programs do not currently recognize experience in cultural burns, and therefore exclude cultural fire practitioners, especially from leadership roles. Many practitioners lament the lack of knowledge of the landscape, ecology, and culture of place by agency personnel, yet, those personnel are empowered to burn, while cultural fire practitioners are excluded. This has forced some Tribes seeking to engage in fire to pursue agency fire training, but this infringes on sovereignty and the ability to maintain continuity of culture.21

RECOMMENDED CHANGES

Ensure that California Native American Tribes are recognized by the state as separate sovereigns able to regulate and control cultural burns and prescribed fire within Indian Country and their broader ancestral territories. Make explicit—through executive order, regulation, or otherwise—that Tribes are not required to obtain burn or smoke permits when burning in Indian Country, and potentially their broader ancestral territories. Additional provisions should be added to cover cultural fire practitioners who are not affiliated with recognized California Native American Tribes.

- ➤ To further implement the first recommendation, amend the Public Resources Code to explicitly exempt Tribes and cultural fire practitioners from any requirement to obtain CAL FIRE permits, regardless of land tenure. The Code's current omission of "Tribe" from the definition of "person" could be made explicit.²² Cultural fire practitioners should be defined broadly to include Tribes, tribal members, Native Americans, and tribal non-profit organizations, and those partner individuals and organizations invited to participate in such burns.²³
- Likewise, amend the Health and Safety Code and air district plans to exempt Tribes and cultural fire practitioners from any requirement to obtain smoke management permits, regardless of land tenure. Smoke from cultural burns should be recognized as part of the baseline emission level across all air quality regulations, not just the Regional Haze Rule, as discussed below. At most, Tribes and cultural fire practitioners should be required to provide notice to air districts regarding cultural burns and anticipated smoke impacts.
- Explicitly define cultural burns and cultural fire practitioners in state law.
- Ensure that any existing or new relaxed liability standard, as discussed below, applies to cultural fire practitioners, including Tribes that engage in government-to-government cooperative agreements with the state.
- Consider mechanisms for ensuring that Tribes can participate in state programs, especially for funding, without waiving sovereign immunity. Such mechanisms could include amendments to state statutes, regulations, and/or funding program guidelines, or better education for agency staff. Alternately, develop

^{19 34} Ops.Cal.Atty.Gen 241 (1959) (finding that "Indians and others owning property within an Indian reservation are required to obtain permits" for prescribed fire, as a result of Public Law 280). This opinion is likely no longer valid after *California v. Cabazon Band of Mission Indians* (1987) 480 U.S. 202, 210, but unresolved questions still exist around the ability of the state to pursue civil penalties or criminal charges against cultural fire practitioners, particularly for an escaped burn that causes damage or bodily harm to non-Indians.

²⁰ Kiowa Tribe v. Manufacturing Technologies, Inc. (1998) 523 U.S. 751, 754; Three Affiliated Tribes of the Ft. Berthold Reservation v. Wold Engineering, P.C. (1986) 476 U.S. 887, 890-91; Puyallup Tribe v. Dept. of Game (1997) 433 U.S. 165, 172-73.

²¹ Eriksen, C.E. and D.L. Hankins, The Retention, Revival and Subjugation of Indigenous Fire Knowledge through Agency Fire Fighting in Eastern Australia and California, USA. Society and Natural Resources (2014).

²² Pub. Resources Code § 4101 (defining person, for the purposes of CAL FIRE permitting, as "any agency of the state, county, city, district, or other local public agency, and any individual, firm, association, partnership, business trust, corporation, limited liability company, or company").

²³ For example, the following definition should be incorporated into state law: "A Native American person engaged in burning to meet cultural goals or objectives, including the enhancement of culturally important resources, or a California Native American Tribe."

standardized language for limited waivers of sovereign immunity, providing that the only remedy for nonperformance or loss is return of allocated funding.

BARRIER: Agencies are ill-equipped to work with Tribes to implement cultural burns.

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As discussed throughout this paper, navigating state and federal law to implement intentional burns is complex. These issues are compounded when Tribes, tribal members, and Native Americans are engaged in this work, given the historical and legal complexities surrounding jurisdiction, land tenure, sovereign immunity, federal and state recognition, and cultural practices.

Cultural fire practitioners repeatedly indicate that agencies are ill-equipped to handle these complexities, leading to delays, increased costs, foregone opportunities, and a lack of appropriate respect. Some of the issues that are reported include:

- On landscapes that include a mosaic of land tenure and jurisdiction, state and federal agencies "trade responsibility and blame" for addressing tribal concerns. Instead of owning particular issues and working with Tribes to address the issues, agencies such as the Bureau of Indian Affairs, the U.S. Forest Service, and CAL FIRE each assert that the responsibility and blame fall on the other agencies. As a result, little is accomplished.
- ➤ Federal and state authorities have difficulty understanding and accommodating the different "status" of cultural fire practitioners. In California, cultural fire practitioners may come from federally recognized Tribes, California Native American Tribes, or non-recognized Tribes, or they may have no official tribal membership. Cultural fire practitioners may also choose to operate as non-profit organizations, such as the Cultural Fire Management Council. These complexities create tension when there is a desire to

define which Native Americans are afforded access to tribal programs, funding, or rights.

- Agency staff, including agency attorneys, have no formal Indian law or cultural competency training. Consequently, cultural fire practitioners may need to spend significant time educating agency staff about the complexities inherent in appropriately treating cultural burning.
- Conversely, the Bureau of Indian Affairs is generally well-versed in Indian law and other tribal-specific issues. However, cultural fire practitioners report that BIA staff has little knowledge or comfort with cultural fire, so BIA staff serves as an active impediment to navigating these complexities with other agencies.

Without knowledgeable, motivated, and empowered agencies partners, tribal cultural practitioners report that they will continue to face difficulties in implementing and expanding the use of cultural burning.

RECOMMENDED CHANGES

- Within each agency (Natural Resources Agency, CAL FIRE, California State Parks, U.S. Forest Service, BIA, National Park Service, Natural Resources Conservation Service, U.S. Fish and Wildlife), ensure that there is at least one person per region that both understands the complexities discussed above and is motivated and empowered to assist cultural fire practitioners in completing cultural burns. Native Americans should be hired for such positions whenever feasible.
- Provide funding for Tribes to employ staff to effectively navigate state and federal agency requirements.
- Evaluate state and federal mechanisms for establishing tribal co-management of public land.²⁴ Such comanagement must affirm tribal sovereignty within ancestral territories and delegate sufficient decisionmaking authority to Tribes. Possible routes include building on Secretarial Order No. 3342²⁵ or the Good

²⁴ E.g., Monte Mills & Martin Nie, Bridges to a New Era; A Report on the Past, Present, and Potential Future of Tribal Co-Management on Federal Public Lands. Missoula, MT: Margery Hunter Brown Indian Law Clinic/Bolle Center for People and Forests, University of Montana (2020). ("Although 638 contracts, self-governance compacting, and similar authorities have opened new avenues for tribes to take on greater (and previously federal) responsibilities, these avenues are mostly limited to existing tribal lands and resources and further hamstrung by a lack of federal funding, continuing agency recalcitrance, and the uncertainty around and inability of tribes to assume so-called "inherently federal functions.").

²⁵ Secretary of Interior Order No. 3342 (2016) (directing Department of Interior resource managers to evaluate and develop collaborative partnerships with Tribes to manage lands under federal control).

Neighbor Authority,²⁶ invoking tribal compacting authority,²⁷ or increasing use of 638 contracts.²⁸

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BARRIER: Cultural Fire Practitioners lack sufficient recognition and support.

The limited number of cultural practitioners and extent of cultural burning at present poses an issue for achieving landscape-scale cultural burning. To overcome this limitation, Tribes and cultural practitioners need support to enact training opportunities to enlist and train community members and enhance knowledge of burning practices. Traditionally, burning at a landscape scale might be overseen by a 'fire boss' (i.e., a recognized practitioner with extensive knowledge and practice) and supported by the larger community or family networks for implementation. Knowledge transfer and capacity building are traditionally intergenerational (all ages) opportunities for learning and doing. Such opportunities outside of private lands burning are extremely rare due to restrictions imposed by qualifications and liability concerns.

Moreover, many traditional cultural practitioners across the state are engaged in stewardship in a 'volunteer' capacity. They tend to their areas primarily on their own or with family or community members, and without funding to support that work. If and where practitioners are working with agencies, it is similarly as un-paid work through "consultation." This creates an issue for equity and equality, and perpetuates the limitations of self-governance.

RECOMMENDED CHANGES

- Provide significant, specific funding to Tribes and cultural fire practitioners to support increased training, opportunities, and cultural fire programs. Pay Tribes and cultural fire practitioners where they assist with agency implementation.
- Amend state law to develop a cultural fire practitioner certification program or programs, with the same benefits as the state-certified burn boss program. but run by cultural fire practitioners rather than the state. Such programs could be established by individual Tribes or by a consortium of Tribes and cultural fire practitioners. While no formal gualifications process exists at present to sanction a cultural practitioner as one gualified to burn on par with agency-based qualifications, a process of lifelong learning, community recognition, and lived experience promotes a process for highly-skilled practitioners to engage in stewardship of the landscape beyond the qualifications afforded by accredited systems.²⁹ Consider whether non-Indigenous people should be allowed to participate in this parallel certification system, an approach that has been implemented successfully in Australia.

^{26 16} U.S. Code § 2113a. The Good Neighbor Authority authorizes the Forest Service and BLM to enter into agreements with Tribes to carry out forest, rangeland, and watershed restoration, management, and protection services on lands in federal control.

²⁷ The Tribal Self-Governance Act (25 U.S.C. §§ 5381-5399) allows tribes to negotiate for a single annual funding agreement or "self-governance compact" for the administration of all programs for tribes or Indians administered by the Department of the Interior.

²⁸ The Indian Self-Determination and Education Assistance Act (25 U.SC. § 5301 et seq.) allows tribes to enter into self-determination contracts with the federal government to take control of federal programs for Indians. These contracts are popularly known as "638 contracts" after the original public law number.

²⁹ Lake, F.K., M.R. Huffman, and D.L. Hankins *in press*. Indigenous Cultural Burning and Fire Stewardship. In: F.C. Rego et al., Fire science from chemistry to landscape management. Springer Nature.



AIR DISTRICT PERMITTING

Smoke and related air quality impacts present a major barrier to all intentional fires.³⁰ Like wildfires, intentional fires produce particular matter (both PM2.5 and PM10) and ozone precursors, which contribute to haze and present a variety of health risks.³¹ While evidence suggests that intentional burning reduces the incidences or severity of wildfires, and therefore reduces the total pollution exposure that Californians might face,³² air quality regulations largely treat intentional fire as a stand-alone emissions source, rather than as a mitigation measure to reduce overall emissions. Consequently, federal, state, and local regulators tasked with protecting public and environmental health have developed a complex framework of oversight and permitting to control these emissions and ensure acceptable air quality.

NATIONAL AMBIENT AIR QUALITY STANDARDS AND EXCEPTIONAL EVENTS

The cornerstone of smoke regulation is the federal Clean Air Act. The Clean Air Act imposes both air quality and visibility regulations that are administered by the Environmental Protection Agency (EPA) and implemented at the state and local level. First, the National Ambient Air Quality Standards (NAAQS) impose quantitative standards for six criteria pollutants on each region within a state.³³ Each state is responsible for reporting emissions to the EPA, which in turn designates whether individual regions are in "attainment," in "nonattainment," or are "unclassifiable."³⁴ States must then prepare State Implementation Plans (SIPs) demonstrating how they will bring all regions into attainment; federally recognized Tribes may also prepare Tribal Implementation Plans (TIPs) and assume jurisdiction of an airshed.³⁵ States may face financial consequences if the EPA finds a region to be in nonattainment of the NAAQS for an extended period.³⁶

³⁰ *See., e.g.,* C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018) (Federal land managers generally report that air quality is a barrier, though not the key barrier.).

See generally Wild Fire Smoke: A Guide for Public Health Officials, rev. 2019, available at https://ww3.arb.ca.gov/smp/regs/wildfire-smoke-guide.pdf; C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).

³² M. Burke et al., NBER Working Paper Series, The Changing Risk and Burden of Wildfire in the US (June 2020) (noting that the ability of prescribed fire to reduce the amount of smoke depends on the efficacy of prescribed fires in reducing the subsequent size of wildfires).

³³ The criteria air pollutants include particulate matter, ground-level ozone, carbon monoxide, lead, sulfur dioxide, and nitrogen dioxide. EPA, Criteria Air Pollutants, available at https://www.epa.gov/criteria-air-pollutants.

^{34 42} U.S.C. § 7407(d); EPA, NAAQS Designation Process, available at https://www.epa.gov/criteria-air-pollutants/naaqs-designations-process.

^{35 40} C.F.R. §§ 49.1-49.11.

One complicating factor in addressing air quality issues is the Clean Air Act's divergent treatment of wildfire emissions and intentional fire emissions.³⁷ Specifically, section 319(b) of the Clean Air Act allows states to exclude from their NAAQS accounting certain emissions that result from "exceptional events."³⁸ An exceptional event is one that the EPA Administrator determines, based on a submittal from a state or Tribe: (i) affects air quality; (ii) is not reasonably controllable or preventable; and (iii) is caused by human activity that is unlikely to recur at a particular location or is a natural event.³⁹

EPA practice has been to exclude wildfire emissions as "natural events." Although all fire is a natural event whose impacts and severity have been exacerbated by decades of fire suppression, and although intentional fire has the capacity to return the fire regime to a more natural state, the EPA stated in its 2019 Guidance on the Exceptional Events Rule that it "would not treat prescribed fire as a natural event ... unless the prescribed fire develops into a wildfire."⁴⁰

Accordingly, states or Tribes seeking exemptions for intentional burn emissions must instead demonstrate on a case-by-case basis that (i) an intentional burn is unlikely to recur at a particular location and (ii) that the emissions from that burn were not reasonably controllable or preventable.41 While this language appears to run counter to both the practice and definition of intentional burns, seeking an Exceptional Events exemption is technically possible. However, the current regulations make this showing exceptionally onerous. To demonstrate that a burn is unlikely to recur at a particular location, states or Tribes must comparing the actual frequency of intentional fire with "an assessment of the natural fire return interval or the prescribed fire frequency needed to establish, restore and/or maintain a sustainable and resilient wildland ecosystem contained in a multi-year land or resource management plan."42 If the burn will not occur more frequently than necessary to establish, maintain, or restore the ecosystem, the fire will be deemed "unlikely to recur" at that location. Similarly, to demonstrate that intentional burn emissions are "not reasonably controllable" a state or Tribe must certifying that it "has adopted and is implementing a smoke management program or ... that the burn manager employed appropriate basic smoke management practices."43 Finally, to demonstrate that intentional burn emissions are "not reasonably ... preventable," the state or Tribe must show that the burn is conducted in accordance with "a multi-year land or resource management plan for a wildland area with a stated objective to establish, restore and/or maintain a sustainable and resilient wildland ecosystem and/or to preserve endangered or threatened species through a program of prescribed fire."44

Before demonstrating compliance to the EPA, states or Tribes must follow a statutory public comment process. The state and/or Tribe must include responses to all comments contesting the factual evidence for the proposed exclusion in their final demonstration to the EPA.

In practice, the cost and logistical difficulty of making a demonstration for each intentional burn make the Exceptional Events Rule an ineffective tool to discount emissions from burns. The immense financial and technical burden of making a demonstration render the process inviable for many Tribes. Even states have been reluctant to submit intentional burns to the EPA for an exceptional event determination—even though fire emissions are based on fuel accumulation, and are arguably both natural and non-preventable in the long run. Available data indicate that *no state* has sought to classify successful intentional burns as exceptional events outside of NAAQS accounting.45

44 Id.

³⁷ M. Burke et al., "Managing the growing cost of wildfire" Stanford Institute for Economic Policy Research, Policy Brief (October 2020)

^{38 42} U.S.C. § 7619(b)(1).

³⁹ *Id.*

⁴⁰ EPA, Exceptional Events Guidance: Prescribed Fire on Wildland that May Influence Ozone and Particulate Matter Concentrations, August 8, 2019, p. 14, available at https://www.epa.gov/sites/production/files/2019-08/documents/ee_prescribed_fire_final_guidance_-august_2019.pdf; see also 81 Fed. Reg. 26,959 (2016); 40 CFR §§ 50.1(j),(k), (m)-(r), 50.14, 51.930.

⁴¹ *ld.*

^{42 40} CFR § 50.14(b)(3).

⁴³ Id.

^{45 &}quot;[A]vailable data indicate[] that, since the 2007 exceptional events policy was promulgated, EPA has concurred in dozens of state petitions to exclude air quality readings influenced by unplanned wildfire events." Kirsten H. Engel, *Perverse Incentives: The Case of Wildfire Smoke Regulation*, 40 Ecology L.Q. 623, 652 (2013). "In contrast, during this same time frame the agency did not concur in a single petition to exclude a prescribed-fire-influenced air quality reading, nor does it appear that any state petitioned to have a prescribed-fire-influenced air quality reading excluded." *Id.*

States therefore regularly count intentional burn emissions against their NAAQS compliance.46 Consequently, Air District regulators are careful to ensure that intentional fires are not likely to result in a NAAQS exceedance.

It should be noted that the Exceptional Events allowance for wildfire smoke impacts is a central pillar of continued fire exclusion and suppression policies. Without it, states would have to reckon with violations of NAAQS, as well as with the severe health and economic impacts to rural, tribal, and now increasingly, urban communities as wildfires increase in frequency and grow larger in size and severity.

REGIONAL HAZE RULE

Second, in addition to the NAAQS, section 169A of the Clean Air Act "declares as a national goal the prevention of any future, and the remedying of any existing, impairment of visibility" in certain national parks and wilderness areas (so-called "Class 1 Areas").⁴⁷ The EPA administers section 169A through the Regional Haze Rule.⁴⁸ The Regional Haze Rule requires states to establish emissions reduction strategies with "the goal of reaching natural background conditions in Federal Class I areas by 2064."49 Critically, intentional burns ignited for the purpose of ecosystem restoration or maintenance or cultural burning conducted for traditional, religious, and ceremonial purposes may be included in a state's determination of natural background conditions.⁵⁰ Other intentional fires may not be included in a state's natural background conditions and are subject to emissions reduction efforts.

STATE IMPLEMENTATION

In California, the Air Resources Board ("CARB") and the State's 35 air districts (e.g., North Coast Unified Air Quality Management District (NCUAQMD), San Joaquin Valley Air Pollution Control District (SJVAPCD), Butte County Air Quality Management District (BCAQMD)) are responsible for ensuring compliance with the NAAQS, the Regional Haze Rule, and other federal and state air guality standards.51 Health and Safety Code section 41850 et seq. grant CARB and the districts the authority to "reasonably regulate[]" agricultural and intentional burning in order to limit associated emissions, including burning conducted by private, local, state, and federal entities.52 Pursuant to that authority, no person may conduct an agricultural or intentional burn without an air quality permit unless CARB first determines a burn will not significantly affect air quality.53 CARB must promulgate guidelines for the regulation and control of intentional burns within each air basin and must determine, based on meteorological data, days when burning shall be prohibited.54 CARB's guidelines are codified at California Code of Regulations, title 17, subchapter 2 ("Smoke Management Guidelines for Agricultural and Prescribed Burning").55 Using these guidelines, each air district has developed individual rules and regulations for intentional burns.

BARRIER: Air quality requirements limit the use of intentional fire.

Pursuant to its mandate under Health and Safety Code sections 41856 and 41857, CARB has established meteorological criteria for agricultural and intentional

⁴⁶ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018) ("Although a few interviewees indicated that the new exceptional events rule creates more space to petition for a prescribed fire that causes exceedances of NAAQS to be considered an exceptional event, interviewees also noted that the significance of the rule change was limited because it does not allow prescribed fire to be exempted from regulation. It is not permissible under the Clean Air Act for federal land managers to intentionally plan and cause for exceedances. As one person said, 'The problem with the exceptional events rule is you've gotta have an exceptional event. You can't plan to have an exceptional event.").

^{47 42} U.S.C. § 7491(a)(1); C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018). (Specifically, Class I Areas include designated wilderness areas over 5,000 acres in size and national parks over 6,000 acres in size. The majority of these Class I areas are in the western states).

⁴⁸ Regional Haze Regulations, 64 Fed. Reg. 35,714, 35,715 (Jul. 1, 1999) (codified at 40 C.F.R. pt. 51).

⁴⁹ Western Regional Air Partnership, Policy for Categorizing Fire Emissions (November 15, 2001), p. i, available at https://www.wrapair.org/forums/fejf/documents/nbtt/FirePolicy.pdf.

⁵⁰ *Id.* at i, 8, 13, 18; see also 40 C.F.R.§ 51.308(f)(1)(vi)(B) (states can add to their "natural visibility condition" emissions from "wildland prescribed fires that were conducted with the objective to establish, restore, and/or maintain sustainable and resilient wildland ecosystems, to reduce the risk of catastrophic wildfires, and/or to preserve endangered or threatened species during which appropriate basic smoke management practices were applied").

⁵¹ Health & Saf. Code §§ 39602 ("The state board is designated the air pollution control agency for all purposes set forth in federal law."), 39606(a)(2) ("The state board shall ... [a]dopt standards of ambient air quality for each air basin in consideration of the public health, safety, and welfare.").

⁵² Health & Saf. Code § 41850; see generally Health & Saf. Code §§ 41850-41866.

⁵³ Health & Saf. Code §§ 41852, 41852.5 (CARB may waive permit requirement if it determines a burn will not significantly affect air quality).

⁵⁴ Health & Saf. Code §§ 41855-41857.

⁵⁵ Cal. Code Regs., tit. 17, §§ 80100-80330 (subchapter 2), available at https://ww3.arb.ca.gov/smp/regs/revfinregwtoc.pdf.

burning for each air basin in the State.⁵⁶ Based on these criteria, CARB is required to declare each day a permissive burn day, a marginal burn day, or a no-burn day.⁵⁷ CARB must make this determination by 3pm each day for the following day.⁵⁸ "If conditions preclude a forecast until the next day, the decision shall be announced by 7:45 a.m."⁵⁹ A marginal burn day designation allows air districts "to authorize limited amounts of burning ... if the air district demonstrates that smoke impacts to smoke sensitive areas are not expected as a result." By contrast, burning is permitted on non-burn days only "when denial of such a permit would threaten imminent and substantial economic loss."⁶⁰

CARB requires each district to maintain a smoke management program to regulate the amount and manner of agricultural and other intentional burning in each district.⁶¹ Each district smoke management program must include a daily burn authorization system that regulates the amount of burning allowed on a daily basis. Projected air quality is to be measured against state standards, NAAQS, and regional haze requirements.⁶² But air quality regulators also must consider more subjective standards, ensuring that the amount of burning "minimize[s] smoke impacts on smoke sensitive areas, avoid[s] cumulative smoke impacts, and prevent[s] public nuisance."⁶³ As a result, air quality regulatory have significant discretion to approve, deny, or condition necessary permits.

If necessary, burns must be prioritized to minimize smoke impacts.⁶⁴ To determine priority, districts are required weigh the extent to which each burn contributes to safety, public health, forest health and wildfire prevention, ecological needs, economic concerns, and disease and pest prevention.⁶⁵ However, agricultural and intentional burns must also compete with other sources of pollution, including residential fires, industrial sources, transportation emissions, and wildfire, as the Air Districts grapple with keeping pollution levels below applicable standards.

These restrictions are particularly difficult to navigate for large, multi-day burns.⁶⁶ Because burn days are declared on a daily basis, burners run the risk of starting a burn and then having to shut it down if air quality impacts change. Requiring the early termination of burns creates real risks to health and safety, particularly if that determination is made by a regulator who lacks on-the-ground knowledge of the operational realities of a particular burn.

RECOMMENDED CHANGES

- Increase the frequency that Air Districts permit intentional fire
 - Direct the Air Resources Board to work with local air district to maximize available burn days both under the existing framework and any new legislative changes.
 - Update CARB Guidelines to more effectively differentiate between agricultural and nonagricultural burns. At present, CARB uses the same meteorological criteria to determine the burn day designation for agricultural fire, prescribed fire, and cultural burning. However, cultural burning and certain types of prescribed fire should be incorporated in an air basin's natural haze baseline. By contrast, prescribed fires that are ignited for purposes other than ecosystem maintenance will generally not count towards natural haze conditions under the Regional Haze Rule.⁶⁷
 - Revise Title 17 and/or related air district rules and regulations to provide more objective standards to air quality regulators for intentional burns, in order to provide greater certainty in the permitting process.

- 59 Cal. Code Regs., tit. 17, § 80110(c)
- 60 Health & Saf. Code § 41862; accord Cal. Code Regs., tit. 17, § 80120.
- 61 Cal. Code Regs., tit. 17, §§ 80140, 80145.
- 62 Id.; see also Cal. Code Regs., tit. 17, § 80101(c) (defining "Air quality").
- 63 Cal. Code Regs., tit. 17, § 80145(a).
- 64 Cal. Code Regs., tit. 17, § 80145(m).
- 65 *Id.*

67 Western Regional Air Partnership, Policy for Categorizing Fire Emissions (November 15, 2001), p. 14-15, available at https://www.wrapair.org/forums/feif/documents/nbtt/FirePolicy.pdf.



⁵⁶ Cal. Code Regs., tit. 17, §§ 80179-80330.

⁵⁷ Cal. Code Regs., tit. 17, § 80110(a)(c).

⁵⁸ Cal. Code Regs., tit. 17, § 80110(b).

⁶⁶ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).

- Permit intentional burns on no burn days where existing local plans are in place to successfully mitigate modelled potential smoke impacts, such as extensive community outreach coupled with a highproficiency air (HEPA) filter loan program.
- Allow for intentional burning during smoke restrictions caused by wildfires when it can be shown that intentional fire smoke will not significantly affect overall air quality levels.
- Seek further guidance from the EPA on the application of the current Exceptional Events rule to intentional fire. In particular, encourage the EPA to recharacterize intentional fire as a "natural event" where it is consistent with historic Tribal practices, reduction of risk, fire resilience, or ecosystem function.
- Amend the federal Clean Air Act to (a) explicitly recognize cultural burning as part of natural, baseline conditions for both NAAQs and regional haze; (b) expand the use of the Exceptional Events rule to more broadly exempt intentional fire and to streamline the submission process—in particular, by allowing annual demonstrations for a particular region rather than requiring a new demonstration for each burn; or (c) broaden the categories of prescribed fire that count as baseline for purposes of the regional haze rule. Emissions should be based on the fire frequency and duration in a restored ecosystem.
- Recognize cultural burning
 - Revise CARB's list of public benefits a local air district must consider when prioritizing intentional burns under district smoke management programs. In particular, districts should consider cultural benefits in addition to ecological, health, and economic benefits. Tribes should have the authority to define cultural benefits.
 - Encourage CARB to work with Tribes to develop TIPs that facilitate cultural burning and prescribed fire, especially where ancestral territories are within or adjacent to Class I areas. At present, only four Tribes

in EPA Region 9 have EPA-approved TIPs, and only one in California.⁶⁸

- Other suggestions
 - Restrict the use of the Exceptional Events rule for wildfires where fire exclusion has contributed to excessive fuel loading in the burned area, to create additional incentives for state action.
 - Require new home construction to include built in HEPA filtration systems. Develop state and federal programs to assist with program implementation.
 - Develop and provide state and federal funding to support local HEPA filter loan programs for active intentional burn programs.

BARRIER: Air districts lack sufficient resources and/or expertise to effectively process permit applications.

Permit applications for intentional burns generally require significant technical expertise to prepare and to process. For example, intentional burns of sufficient size and those located near smoke-sensitive receptors require the submittal of a smoke management plan.⁶⁹ These plans must be submitted well in advance of a proposed burn and must contain substantial technical data, including estimates of the burn duration, identification and location of all smoke sensitive areas, a detailed meteorological prescription that must be met in order to conduct the burn, and contingency plans if smoke conditions become unacceptable.⁷⁰ The quality of an applicant's smoke management plan will vary based on the level of technical expertise the applicant has or can retain and the nature of the population(s) at risk in the sensitive receptor area.

Likewise, each air district's ability to analyze fully an applicant's smoke management program will vary with the technical expertise and resources of the district. The varying level of technical expertise and availability of air district staff means that applicants often face long lag times with respect to permit processing, and applicants with access to technical experts have a greater probability of obtaining permits.

⁶⁸ See 40 C.F.R. §§ 49.5511-49.5515 (identifying plans for the Gila River Indian Community, the Navajo Nation, the Pechanga Band of Luiseno Mission Indians of the Pechanga Reservation, and the Salt River Pima-Maricopa Indian Community).

⁶⁹ E.g., NCUAQMD, Smoke Management Plan (SMP) Application, available at <u>http://www.ncuaqmd.org/files/forms/NCUAQMD%20SMP%20</u> <u>Application%20Package%20(rev%201-21); see also</u> Cal. Code Regs., tit. 17, § 80160.

⁷⁰ See, e.g., NCUAQMD, Regulation II, Rule 206, available at <u>http://www.ncuaqmd.org/files/rules/reg%202/Rule%20206.pdf</u>; see also 17 Cal. Code Regs. § 80160; BAAQMD Form Rx-1, Prescribed Burning Smoke Management Plan, p. 3, available at <u>https://www.baaqmd.gov/~/media/files/compliance-and-enforcement/open-burning/rx_burn_smp_form.pdf?la=en</u> ("All SMPs must be submitted to the Air Pollution Control Officer (APCO) for review at least 30 calendar days prior to the proposed burning (See Regulation 5, Section 408.1).").

Air district agency culture may also reduce the probability of timely obtaining a permit. Risk-averse staff may be less willing to issue intentional burn permits, particularly if projects are located near sensitive receptors. Both the Health and Safety Code and the CARB regulations that implement it (e.g., Title 17) contain broad prohibitions against public nuisance and impacts to health and safety.⁷¹ However, neither provides clear guidance about what smoke impacts might constitute a public nuisance or other impermissible impact. Additionally, despite the Legislature's statement of intent that agricultural and intentional burning should "not be prohibited,"⁷² there is no consequence for air districts delaying or denying a permit. Overly cautious staff may thus be reluctant to issue burn permits where they perceive risk.

RECOMMENDED CHANGES

- As explained above, revise either Title 17 or individual district rules to reduce the discretion of individual districts and district staff to deny permits where an applicant meets objective requirements. Districts should develop clearer benchmarks for impacts of concern and should establish a mandatory timeline to process permit applications. Districts should clearly delineate the emissions tradeoffs of intentional fire versus catastrophic wildfire.
- Amend air district rules to allow permits to be implemented within one or two years from date of approval, rather than within the calendar year. This increased flexibility would buffer against delays in the permit process and prevent delays from becoming functional denials.
- Provide air districts with more financial or technical resources to ensure that district staff can make timely, evidence-based decisions. SB 1260 directed the legislature to appropriate funds for enhanced

smoke monitoring,⁷³ but more directed funding is likely warranted.

- Where applicants can show using BlueSky or other accepted smoke modelling that proposed burns will not cause harmful smoke impacts, require air districts to consider this information in permitting decisions.
- To address concerns about sensitive receptors, the legislature could fund and/or the air districts could require additional coordinated outreach and implementation of targeted mitigation measures for certain communities (i.e., air purifiers, access to clean locations, stipends).
- Air districts should develop partnership agreements with Tribes, to foster smoke management coordination and Tribal capacity building. Building Tribal capacities to manage air quality related to cultural burning could relieve burdens on understaffed Tribes and air districts.

BARRIER: Permits are expensive.

Permits for intentional fires can be expensive to obtain and may be cost-prohibitive for private burners. For example, the NCUAQMD processes intentional burn applications as "Non-Standard" burn permits.⁷⁴ Fees are dependent on project size, ranging from \$40 for sub-1 acre burns to \$1,250 for burns greater than 300 acres.⁷⁵ Additional payments are required for plan review and no burn day request.⁷⁶ Permitting costs for a large intentional burn may therefore approach \$1,400, even before applicants factor in the cost of preparing the permit application and an associated smoke management plan. As shown in Appendix A, however, fees can vary wildly by district.⁷⁷

Nominally, these fees are imposed to allow air districts to recover direct and incidental costs associated with their burn programs.⁷⁸ Health and Safety Code section 41512.5 authorizes each "district board [to] adopt a

⁷¹ Health & Saf. Code § 41700 ("a person shall not discharge from any source whatsoever quantities of air contaminants or other material that cause injury, detriment, nuisance, or annoyance to any considerable number of persons or to the public, or that endanger the comfort, repose, health, or safety of any of those persons or the public, or that cause, or have a natural tendency to cause, injury or damage to business or property") (emphasis added); Cal. Code Regs., tit. 17, § 80145(a) (district's daily burn authorization system must "minimize smoke impacts on sensitive areas, avoid cumulative impacts, and prevent public nuisance").

⁷² Health & Saf. Code § 41850.

⁷³ Pub. Resources Code § 4495.

⁷⁴ NCUAQMD, Non-Standard Burn Permits, available at http://www.ncuaqmd.org/index.php?page=nonstandard.permits#:~:text=A%20valid%20 burn%20permit%20can.order%20payable%20to%20the%20AQMD.

⁷⁵ NCUAQMD, Regulation IV, Rule 408(C)(2), rev. September 19, 2019, available at http://www.ncuaqmd.org/files/rules/reg%204/Rule%20408,%20 9-19-19.pdf.

⁷⁶ *Id.* at (C)(3), (6).

⁷⁷ For example, Butte County charges \$140 for a prescribed fire permit and an additional \$1 per acre burned. Permits in Glenn County range from \$40 for burns under 10 acres to \$1,010 for burns over 1,000 acres.

⁷⁸ NCUAQMD, Regulation IV, Rule 408(A), rev. September 19, 2019, available at <u>http://www.ncuaqmd.org/files/rules/reg%204/Rule%20408,%209-19-19.pdf</u>.

schedule of fees ... to cover the estimated reasonable costs of evaluating plans required by law or by district rule or regulation, including, but not limited to, review, inspection, and monitoring related thereto."⁷⁹ "The fees shall not exceed the estimated costs of reviewing, monitoring, and enforcing the plan for which the fees are charged."⁸⁰ However, there is ongoing concern among some stakeholders that the actual fees charged by air districts to process burn permits may not bear a reasonable relationship to districts' actual costs.

Some air districts have sought to reduce or eliminate these fees for public purpose burning. For instance, NCAQMD currently uses funding from CARB's Prescribed Burn Reporting and Monitoring Support Grant to subsidize application fees for burns that are in the public interest and will benefit the State.⁸¹ Eligibility for a waiver or subsidy is determined on a case-by-case basis by the Air Pollution Control Officer in charge of each application.⁸² Under current law, a burn may "be considered for the public interest and beneficial to the state" if it serves one of the following purposes: prevention of high-intensity wildland fires through reduction of the volume and continuity of wildland fuels; watershed management; range improvement; vegetation management; forest improvement; wildlife habitat improvement; or air quality maintenance.⁸³ NCUAQMD includes cultural burns among these beneficial purposes.⁸⁴ While the NCUAQMD subsidy provides an opportunity to reduce the cost of intentional burns, the substantial discretion afforded district staff and the impending sunset of funding⁸⁵ are barriers to widespread application of that program.

RECOMMENDED CHANGES

- The state legislature should either eliminate or reduce application fees for public purpose burning or should direct additional funding to cover or reduce such fees.⁸⁶
- Likewise, CARB should consider reissuing its Prescribed Burn Reporting and Monitoring Support grants and providing air districts with more direct guidance regarding the waiver or subsidy of intentional burn permit fees.

⁸⁶ NCUAQMD, Regulation IV, Rule 408(D), rev. September 19, 2019, available at <u>http://www.ncuaqmd.org/files/rules/reg%204/Rule%20408,%209-19-19.pdf</u>.



⁷⁹ Health & Saf. Code § 41512.5.

⁸⁰ *Id.*

⁸¹ NCUAQMD, Application for Fee Subsidy/Waiver of Non-Standard Burn Permit w/ SMP, available at http://www.ncuaqmd.org/files/forms/NS%20 Burn%20Permit%20Fee%20WAIVER%20Request%20Form%20-%20Rx%20Fire%20Grant,%20rev%209-19.pdf
(containing a check box for "Cultural" burns).

⁸² NCUAQMD, Regulation IV, Rule 408(D), rev. September 19, 2019, available at http://www.ncuaqmd.org/files/rules/reg%204/Rule%20408.%209-19-19.pdf.

⁸³ *Id.*; Pub. Resources Code § 4475(a).

⁸⁴ NCUAQMD, Application for Fee Subsidy/Waiver of Non-Standard Burn Permit w/ SMP, available at http://www.ncuaqmd.org/files/forms/NS%20 Burn%20Permit%20Fee%20WAIVER%20Request%20Form%20-%20Rx%20Fire%20Grant,%20rev%209-19.pdf
(containing a check box for "Cultural" burns).

⁸⁵ Notice of Exemption, Prescribed Burn Reporting and Monitoring Support Program, available at <u>https://files.ceqanet.opr.ca.gov/253360-2/attachment/pgn8v0RdFj4uol9P8doNfHKGq3DC2H10v2YmfKy8CKq2r8l-hblqk_6942egZHD3izfWHW6W7c6Mq_1-0</u> (noting the grants terminate on June 30, 2021).



CAL FIRE PERMITTING

O ne common barrier identified by private burners is the difficulty of securing any necessary CAL FIRE burn permits. State law requires landowners or managers to obtain "a written permit" prior to burning "any brush, stumps, logs, fallen timber, fallows, slash, grasscovered land, brush-covered land, forest-covered land, or other flammable material."⁸⁷ This requirement has both geographic and timing restrictions. Permits are only required in State Responsibility Areas⁸⁸ or areas receiving fire protection by the Department by contract. And in such areas outside of Mono, Inyo, San Bernardino, Santa Barbara, Ventura, Los Angeles, Orange, Riverside, San Diego, and Imperial Counties,⁸⁹ permits are only required between May 1st and the end of fire season, as declared by the CAL FIRE Unit Chief for each district, or during "unusual fire hazard conditions."⁹⁰

Sections 4491 – 4494 of the Public Resources Code further describe the process for obtaining CAL FIRE permits for intentional burns. Any "person, firm, or corporation" that owns or controls lands within the State Responsibility Area may apply to CAL FIRE for a burn permit.⁹¹ The

application must "contain a description of the lands and other pertinent information."⁹² In response, CAL FIRE must inspect the land and make a discretionary determination as to whether to issue the permit. State law provides CAL FIRE with wide latitude, allowing it to "prescribe the manner in

89 These counties are known as "Zone A," where permits area always required. Pub. Resources Code §§ 4413, 4423(a).

- 91 Pub. Resources Code § 4492.
- 92 Id.

⁸⁷ Pub. Resources Code § 4423.

⁸⁸ State Responsibility Areas define the area where CAL FIRE has financial responsibility for fire suppression and prevention, and are established by the Board pursuant to Public Resources Code section 4125. These areas can be viewed here: https://www.firepreventionfee.org/sra-lookup/. State Responsibility Areas encompass 31 million acres of public and private lands. See Vegetation Treatment Program Programmatic EIR at 2-1.

⁹⁰ Pub. Resources Code § 4423(b).

which the site for the prescribed burning shall be prepared" and to impose "any precautions ... as may be considered reasonable" including "advance preparation of firebreaks" and the specific "firefighting equipment and personnel."⁹³ CAL FIRE has discretion to decline to issue the permit.⁹⁴ Beyond this broad and general state statutory law, neither state regulations nor publicly available information appear to offer guidance for how CAL FIRE should process or condition intentional burn permits.

CAL FIRE generally issues three types of permits for intentional fire. An LE-62A permit is for standard burn piles.⁹⁵ An LE-5 is for "non-standard piles" and can include "small plots of grass or weeds in lots or residential properties" or "small parcels or strips for hazard reduction."96 And LE-7 permits are for "Project Type Burns." These permits generally incorporate a Form LE-8 as well, which sets forth the "Minimum Precautions for Project Type Burning." Through this form, the Department will "provide direction or technical advice on ways to conduct an effective burn based on the local knowledge of weather, vegetation, topography, fire history, and any other relevant factors."97 Notably, CAL FIRE does not make this information readily available to the public: the relevant websites discuss pile burning and CAL FIRE-led prescribed burn efforts only.⁹⁸ Burners also report that CAL FIRE employees frequently lack accurate information about the permitting process.

BARRIER: CAL FIRE refuses to issue permits or overly condition permits

As a result, burners are often at the whim of CAL FIRE field staff in whether burns will be allowed. Private burners cite three common reasons why CAL FIRE staff will deny permits⁹⁹:

- CAL FIRE determines that the proposed burn is too dangerous. Under current CAL FIRE procedures, this can occur even if the permittee's burn plan demonstrates that the proposed burn can be completed safely and within prescription.
- CAL FIRE is unable to provide standby fire protection because CAL FIRE crews are actively involved in suppression efforts either within the district or elsewhere in the state. Permits may be denied even if the burner demonstrates adequate backup capacity without CAL FIRE (such a local fire district support). Notably, Public Resources Code section 4491(c) is clear that CAL FIRE may but is not required to provide standby fire protection.¹⁰⁰ Nevertheless, field staff currently have significant discretion to make burn permit determinations.
- CAL FIRE believes it may be unable to provide standby fire protection because of high fire risk elsewhere in the district or elsewhere in the state. Again, permits may be denied even if the burner demonstrates adequate backup capacity without CAL FIRE (such a local fire district support).

In addition, some private burners indicate that CAL FIRE routinely requires greater precautions, equipment, and personnel then warranted by the burn plan. These requirements can add unexpected costs and delay.¹⁰¹ Others, however, indicate that CAL FIRE feedback and conditions generally improve the burn. There is significant variability on required resources based on local CAL FIRE battalion chiefs and their relationships with private burners in their area.

- 95 Brian Mattos, CAL FIRE Prescribed Fire Planning & Permitting Power Point
- 96 Brian Mattos, CAL FIRE Prescribed Fire Planning & Permitting Power Point
- 97 Brian Mattos, CAL FIRE Prescribed Fire Planning & Permitting Power Point
- 98 See https://burnpermit.fire.ca.gov/ (describes availability of permits for "[d]ry, natural vegetation, grown on the property[,] burned in open piles" not broadcast burning and states that prescribed fire "are carefully planned and executed by CAL FIRE during appropriate fuel conditions and weather conditions").
- 99 CAL FIRE staff has also recognized these parameters: "Burn permits may be suspended at any time due to adverse weather conditions, adverse burning conditions, or state-wide incident activity resulting in CAL FIRE resource draw down." See Brian Mattos, CAL FIRE Prescribed Fire Planning & Permitting Power Point.
- 100 CAL FIRE may "provide standby fire protection, to the extent the personnel, fire crews, and firefighting equipment are available." Pub. Resources Code 4491(c). This language implies that standby fire protection should not be a *mandatory* requirement, but an optional service.
- 101 To the extent that such requirements are difficult to follow, they may also jeopardize the ability of the burner to show full compliance with the burn permit and the resulting prima facie showing of due diligence. See Liability section, *infra*.



⁹³ Pub. Resources Code § 4493.

⁹⁴ Pub. Resources Code § 4494.

RECOMMENDED CHANGES

- Direct CAL FIRE to develop an accurate website for prescribed fire and cultural burn permits; educate agency staff regarding requirements.
- Amend Sections 4491 to 4494 of the Public Resources Code to make it easier for private burners to obtain permits for broadcast burning. Potential amendments include: mandating that CAL FIRE develop a ministerial program for considering LE-5 and LE-7 permits, with objective standards and established, publicly available conditions (i.e., so long as a burn plan meets certain conditions, then permit will be issued); establish that

private and cultural burners have a right to burn; set a timeline for decisions; mandate that permits have longer terms; eliminate availability of CAL FIRE standby fire protection as a factor for consideration, so long as permittee provides sufficient crews; and eliminate wildfire risk in other parts of the state as a factor of consideration.

Amend the Public Resources Code to allow CAL FIRE notification in lieu of permits for specified types of prescribed burns, including burns for ecological maintenance.





LIABILITY

Numerous studies have shown that intentional fires are generally safe. A meta-study from March 2020 found an escape rate of less than one percent for over 23,000 burns.¹⁰² Of those escaped burns, most were small, and only one resulted in an insurance claim. No lawsuits were filed as a result.¹⁰³

BARRIER: Liability Concerns Inhibit Burning

Nevertheless, potential liability for damages or bodily harm caused by the use of intentional fire, particularly by any escape, is often cited as a barrier to further expansion of the practice. Landowners, organizations, and individuals may have a generalized fear about potential lawsuits, or may believe that the current liability standards in California—a modified simple negligence standard—may be insufficiently protective. As a result, they likely engage in fewer burns, smaller or less complicated burns, or no burns at all, as compared to what they would do if liability was less of a concern.¹⁰⁴ Moreover, the liability standard directly impacts both the availability of and perceived need for liability insurance, as discussed in the next section.

Historically, California absolutely prohibited the use of intentional fire ("every person who willfully or negligently sets on fire any woods, prairies, or grasses on any lands is guilty of a misdemeanor").¹⁰⁵ But the California Supreme Court ultimately struck down the statute, finding that it impermissibly interfered with property rights.¹⁰⁶

¹⁰² J. Weir et al, "Prescribed Fire: Understanding Liability, Laws and Risk" OSU Extension (NREM-2905) (March 2020).

¹⁰³ *Id*.

¹⁰⁴ See, e.g., Wonkka et al. Legal Barriers to Effective Ecosystem Management: Exploring linkages between liability, regulations and prescribed fire. Ecological Applications (2015) ("Controlling for potentially confounding variables, we found that private landowners in counties with gross negligence liability standards burn significantly more hectares than those in counties with simple negligence standards.").

¹⁰⁵ Pen. Code, § 384 (repealed - Stats. 1939, Ch. 60).

¹⁰⁶ Garnier v. Porter (1891) 90 Cal. 105, 108 ("It is not to be believed that it was intended by these penal laws to prohibit common farming operations.").

Since then, California has been a "simple negligence" state, with some recent modifications. Specifically, this liability standard means that any person "who personally or through another, willfully, negligently, or in violation of law" sets fire or allows an escaped fire to damage another's property is liable for that damage.107 Likewise, property owners can be liable for third-party damage caused by fire escaping from their property, even if they do not set the fire, if they are found to have failed to exercise "due diligence" to control the fire.108 While these statutes refer explicitly to *property* damages, courts have held that burners and property owners can also be liable under these statutes for other harms, such as bodily injury, death, or smoke-related harms.109

State law also holds burners responsible for fire suppression costs. Specifically, any anyone who "negligently, or in violation of the law" allows a fire to escape is liable for the costs of fire suppression costs, rescue and medical services, and related investigations.¹¹⁰ These costs—as well as related attorneys' fees—can be significant.¹¹¹

A simple negligence standard is highly fact dependent. Typically, California law finds that a person acts with due diligence, and therefore is not negligent, if the person did what might reasonably be expected of a person of ordinary prudence, acting under similar circumstances.¹¹² Therefore, to evaluate if a burner or landowner was negligent, a court would be tasked with determining both what the burner or landowner did to cause the burn, and what a "reasonably prudent person" would have done under the circumstances. These are subjective standards, which can create uncertainty for landowners and burners as to their potential liability.

In 2018, SB 1260 (Jackson) modified the simple negligence standard in a small way to help address some of this uncertainty. Specifically, if a burner obtains a burn permit from CAL FIRE (as described in the previous section), then state law now provides that "[c]ompliance with the permit issued [] constitute[s] prima facie evidence of due diligence."¹¹³ In other words, if the burner obtains a CAL FIRE permit, and can demonstrate compliance with every term, then the burner has proven—in the first instance—that their actions were not negligent and they should not be liable. The harmed party may rebut that showing, such as by proving that the burner did not comply with the terms of the permit, that the permit terms were not reasonable, or that the permit was obtained with false or misleading information.

Theoretically, this change in law should make it easier for burners to defend against lawsuits seeking damages for escaped burns. Instead of needing to first establish what a "reasonably prudent person" would have done, and then comparing their actions to that standard, the burner need only compare their actions to the terms of the permit. This inquiry is less fact dependent and less subjective.

However, this small change in the liability standard does not appear to have had much impact on reducing barriers to intentional fire in California. First, the change is highly technical and difficult to explain to non-lawyers; most landowners and would-be burners are still likely to be concerned about liability. Second, the relaxed liability standard only applies if the landowner or burner actually obtained a CAL FIRE permit. As explained above, there are parts of the year and geographic areas where CAL FIRE permits are not required and/or may be difficult to obtain. Cultural fire practitioners may also choose to forego CAL FIRE permits, which infringe on tribal sovereignty. Third, CAL FIRE permits can include many technical and arguably overbroad terms; lack of compliance with such terms may have little impact on actual risk but may have the unanticipated consequence of making it easier to prove liability. Indeed, practitioners have reported CAL FIRE permits that contain language indicating that the permit is void if the fire escapes for any reason. Some CAL FIRE employees also appear to lack education about this provision and inform burners that any escape will result in criminal prosecution. In addition, and as discussed further below, the change in the liability standard has not provided sufficient assurance to insurance companies, who have

¹⁰⁷ Health & Saf. Code § 13007.

¹⁰⁸ Health & Saf. Code § 13008.

¹⁰⁹ E.g., Anderson v. U.S. (9th Cir. 1995) 55 F.3d 1379, 1384, fn. 5.

¹¹⁰ Health & Saf. Code § 13009(a).

¹¹¹ For instance, in 2016, CAL FIRE filed suit against Bill Massa, a landowner who lost control of a burn in Monterey County in high wind conditions, seeking repayment of fire suppression costs. After a jury trial, the court awarded CAL FIRE damages of \$250,000. The state then sought recovery of its attorneys' fees, which totaled over \$800,000. California Department of Forestry and Fire Protection v. Massa (Monterey County Superior Court Case No. 16-CV-004012).

¹¹² Negligence 1. [§ 956] Definitions., 6 Witkin, Summary 11th Torts § 956 (2020)

¹¹³ Pub. Resources Code § 4494(b).

largely left the market since SB 1260 was passed. Finally, it is not clear whether the change in liability standard has actually reduced the likelihood that a landowner or burner would face a lawsuit if an intentional fire escaped and caused damage. Even if a harmed third-party is unlikely to ultimately prevail in litigation, they (or their insurance company) still may file a complaint hoping to reach a settlement.

Burners can also face criminal liability for escaped fire. State law classifies both escaped fires caused by negligence (i.e., "without using every reasonable and proper precaution") and burning without a permit in a State Responsibility Area as misdemeanors, which carry potential penalties of up to \$1,000 and/or six months in prison.¹¹⁴ However, the authors are unaware of any recent situation in which a burner faced criminal penalties for an escaped burn.

State and federal employees have different liability considerations. Generally, state and federal employees will not be held personally liable for property damage or bodily injury caused by a prescribed fire set in the course of their employment.¹¹⁵ Personal liability only attaches if the employee is found to be acting outside of the scope of their work.¹¹⁶ Nevertheless, some agency employees cite concern about personal liability as a barrier.¹¹⁷

Even if agency employees are unlikely to be held personally liable, the agency may still be held responsible and ordered to pay damages. For example, the USFS can be held liable under the Federal Tort Claims Act for an escaped burn if a private person would be liable to the claimant in analogous circumstances, though a significant exception exists for activities that involve the exercise of "discretionary function."¹¹⁸ Concerns about agency liability—and resulting impacts on an individual's career and livelihood—are therefore noted as barriers to increased use of prescribed fire.¹¹⁹ For cultural fire practitioners, the question of liability is also relevant. Traditional law and reciprocal relationships with the landscape and inhabitants creates accountability for one's actions. The 'penalties' for improper use or care of fire naturally regulate poor decision making around fire. However, the current state of the landscape and the realities of reconnecting to a given place with fire pose some challenges and inherent risks which historically may not have existed. The largest uncertainty is the slightest possibility of a cultural burn becoming an escaped burn, causing property damage or bodily harm. Such liabilities rightly create an aversion to the willingness to uphold responsibilities to burn and steward. In order to restore fire within the landscape, the associated liabilities and risks need to be reasonable and practicable to support cultural burning.

Finally, the application of the gross negligence standard to Tribes and cultural fire practitioners should be given careful consideration. Tribes and their employees are likely protected from tort liability by tribal sovereign immunity, which applies to tribal activities unless specifically abrogated or waived by Congress.¹²⁰ Any statutory amendments should be drafted to ensure that tribal sovereign immunity is not affected. However, individual Tribal members or other cultural fire practitioners—when not acting pursuant to tribal authority or employment—are not similarly protected.¹²¹ Attention should be given to ensure that such burners are afforded the relaxed liability standard without needing to submit to CAL FIRE or other agency jurisdiction.

RECOMMENDED CHANGES

- Adopt a gross negligence standard for intentional burns.
 - This could be done for all burns, or only if certain conditions are met. A broad application would likely lead to the largest increase in burning, but the

¹¹⁴ Health & Saf. Code § 13000; Pub. Resources Code §§ 4021, 4422, 4435.

¹¹⁵ E.g., Pyne v. Meese (1985) 172 Cal.App.3d 392, 405. CAL FIRE and its employees also have statutory immunity from suit for many of their activities. See, e.g., Gov. Code §§ 850, 850.2, 850.4.

¹¹⁶ E.g., White v. Towers (1951) 37 Cal.2d 727, 733.

¹¹⁷ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018) ("Some burners, especially with the Forest Service, said they were not always sure the agency would support them in case of an escape, whereas others felt confident that they would have legal protection from the agency as long as they acted within the scope of their duties and parameters of their burn plans. Some said they were encouraged to hold private insurance; others said this was not necessary.")

^{118 28} U.S.C. §§ 1346(b), 2674; Rayonier Inc. v. United States (1957) 352 U.S. 315; Anderson v. United States (9th Cir. 1995) 55 F.3d 1379.

¹¹⁹ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).

¹²⁰ Kiowa Tribe v. Manufacturing Technologies, Inc. (1998) 523 U.S. 751, 754; Three Affiliated Tribes of the Ft. Berthold Reservation v. Wold Engineering, P.C. (1986) 476 U.S. 887, 890-91; Puyallup Tribe v. Dept. of Game (1997) 433 U.S. 165, 172-73.

¹²¹ Hardin v. White Mountain Apache Tribe (9th Cir. 1985) 779 F.2d 476, 479-80; Fraizer v. Turning Stone Casino (N.D.N.Y. 2003) 254 F.Supp.2d 295, 307.

state likely is unwilling to adopt such a standard without guardrails. Common conditions from other states include (a) approval of a prescribed burn plan and/or issuance of a burn permit by a state agency and (b) use of a state-certified burn boss. Other conditions could include limits on the size of planned burns, application to public purpose burning only, adherence to certain objective standards outlined in state law or regulations, or approval from or agreement with a California Native American Tribe. However, given the concerns about CAL FIRE capacity and willingness to engage in prescribed burn activity, as described elsewhere in this paper, as well as concerns about infringement on tribal sovereignty, caution is warranted in tying a gross negligence standard exclusively to authorization. approval, or involvement of CAL FIRE. Such a standard should include a specific recognition of the rights of federally recognized Tribes to burn without CAL FIRE involvement in Indian Country, without foregoing the gross negligence standard.

- The gross negligence standard could also be adopted only for certain types of damages. As explained above, burners can be liable for direct property damage and bodily harm, indirect damage or harm caused by smoke, and fire suppression costs. The gross negligence standard could be applied to only some of these types of damages. For example, in South Carolina, the gross negligence standard applies only to claims arising out of smoke. As described further below, the uncertainty of smoke-related damages has been problematic for insurers, so application of the gross negligence standard for smoke damages may have benefits for the insurance market.
- Legislate a per burn or per acre cap on total damages that can be sought against a burner, as appropriate to balance risk for burners and protection for landowners.
- Eliminate potential recovery for fire suppression costs for public purpose burning by modifying Health & Safety Code § 13009(a).
- Adopt an immunity statute. Based on conversations with insurers, a gross negligence standard alone is unlikely to result in a significant reinvestment in the California prescribed fire insurance market. However,

a statute that provides complete immunity would likely have the desired effect. While such a change may be politically difficult, it is not without precedent. California's Recreational Use Statute provides that a property owner "owes no duty of care" and is therefore immune from suit by people using such land for any recreational purpose.¹²² In that statute, exceptions are provided only for "[w]illful or malicious failure to guard" or instances where the property owner is paid or expressly invites people to recreate on the land.¹²³ Different exceptions would likely be necessary for any analogous prescribed fire statute.

- Increase education among agency staff related to potential liability issues, to provide assurance that agency staff will not face personal liability and to clarify the limited circumstances in which the agency may be liable.
- Consider initiating a broader review of the framework for fire-related liability, to recognize that property owners that fail to adequately maintain the fuel on their property should be more culpable than burners who are investing in proactive land management.

It should be noted that a gross negligence standard, or even an immunity standard, will not prevent all potential litigation or exposure to damages, nor should it. For example, the 2018 Valley Fire in Nevada, which had been set by the Nevada Division of Forestry and later rekindled, destroying numerous homes, resulted in multiple lawsuits. After a jury found the Division to be grossly negligent, the state ultimately settled for \$25 million.¹²⁴ Notably, the Division had failed to comply with many basic standards of responsible fire management. Likewise, the 2018 Lime Rock Road Fire in Florida, which was set by a private contractor to the Florida Fish and Wildlife Conservation Commission and ultimate burned 320 acres and multiple homes, resulted in numerous lawsuits.¹²⁵

¹²² Civil Code § 846(a).

¹²³ Civil Code § 846(d).

¹²⁴ https://www.stephenosbornelaw.com/uncategorized/25-million-little-valley-fire-jury-found-ndf-grossly-negligent/; https://www.rgi.com/story/ news/2019/06/12/nevada-ag-recommends-25-m-settlement-little-valley-fire/1435711001/.

^{125 &}lt;u>https://insurancenewsnet.com/oarticle/lime-rock-road-fire-lawsuit-filings-begin</u>.

A NOTE ON OTHER STATES

Five other states have adopted gross negligence standards, in whole or in part: Florida, Georgia, Michigan, Nevada, and South Carolina.¹²⁶ Perhaps unsurprisingly, states with gross negligence standards see significantly more private burning.¹²⁷ While Georgia, Michigan, and Nevada have had their gross negligence standards in place for decades, more recent activities in Florida and South Carolina may provide instructive examples as advocates navigate how to push for this change.

In Florida, the original prescribed burning law was enacted in 1999 after drought-induced wildfires burned 500,000 acres. The gross negligence standard applied if the burner prepared a compliant burn plan and used a certified burn manager. However, after a high-profile case in which the jury and then the court of appeal found gross negligence for an escaped burn despite apparent precautions, the state legislature acted in 2013 to strengthen the protections even further.¹²⁸ The current legislation provides a good example of specific language that could ensure that the gross negligence standard is applied appropriately.

In 2012, South Carolina became the most recent state to adopt a gross negligence standard.¹²⁹ Importantly, however, the statute provides a gross negligence standard *only with respect to liability caused by the resulting smoke of a prescribed fire*.¹³⁰ A large coalition of advocates pushed for this change.¹³¹ More research is warranted to understand why they sought the narrow standard, the political implications of that decision, and the impact this shift has had on prescribed fire use and the insurance market in the state. It also appears that North Carolina sought a similar change, but that it has not passed.¹³²



¹²⁶ See Appendix B for specific laws.

¹²⁷ Wonkka et al. Legal Barriers to Effective Ecosystem Management: Exploring linkages between liability, regulations and prescribed fire. Ecological Applications (2015) ("Controlling for potentially confounding variables, we found that private landowners in counties with gross negligence liability standards burn significantly more hectares than those in counties with simple negligence standards.").

¹²⁸ https://insurancenewsnet.com/oarticle/lime-rock-road-fire-lawsuit-filings-begin.

¹²⁹ In 2012, Tennessee sought to pass the Tennessee Prescribed Burning Act, which would have established a Certified Burn Manager training program and offered the gross liability standard for such Burn Managers, so long as they developed a written burn plan and stayed on site. Days before the bill was to be considered by the Tennessee Senate, an escaped prescribed fire (the Lower North Fork Fire) resulted in extensive damage and three fatalities in Colorado, and effectively sunk the bill. See C. Wonkka, Legal Barriers to Effective Ecosystem Management: Exploring linkages between liability, regulations, and prescribed fire. Ecological Applications (2015).

¹³⁰ Section 48-34-50 (https://www.scstatehouse.gov/code/t48c034.php).

¹³¹ The group appears to include the South Carolina Prescribed Council, SC Forestry Association, SC Forestry Commission, The Nature Conservancy, Association of Consulting Foresters, Camo Coalition, Coastal Conservation League, International Paper, Kapstone Charleston Kraft, LLC, MeadWestvaco, National Wild Turkey Federation, Palmetto Agribusiness Council, Palmetto Center for Policy Alternatives, Palmetto Conservation Foundation, Quality Deer Management Association (QDMA), Resource Management Services, LLC, Society of American Foresters–SC Chapter, SC Department of Natural Resources, SC Farm Bureau, SC Foresters Council, SC Prescribed Fire Council Association, SC State Chapter of the Quality Deer Management Association, SC Timber Producers, SC Tree Farm Committee, SC Wildlife Federation, and the US Forest Service.

¹³² https://bioone.org/journals/Natural-Areas-Journal/volume-29/issue-1/043.029.0108/Prescribed-Burning-in-State-Park-Properties-of-North-Carolina-and/10.3375/043.029.0108.full.



INSURANCE

As a result of the potential for both litigation and liability for damages, landowners, private organizations, and burners routinely seek insurance coverage for prescribed burn activity. Unfortunately, in the last two years, the insurance market has largely collapsed in California and liability insurance is routinely unavailable for many private burners.¹³³

BARRIER: Insurance products are unavailable, expensive, or inadequate

At this time, the majority of organizations, burn bosses, and landowners with coverage for prescribed fire have grandfathered policies, meaning that the insurance company is willing to keep the coverage in place only for existing customers. Such policies are increasingly expensive. In 2020, one of the main insurers providing Loggers Broadform insurance for prescribed fire in California, AGCS Marine/Allianz Insurance, dropped these policies or amended them to exclude prescribed fire activities. Moreover, many policies only provide \$1 or \$2 million in coverage, which may be insufficient in the event of a significant escaped fire. Perhaps of greater concern, some organizations report that their general commercial liability policies will be voided if the conduct or participate in prescribed fire, thus putting the organization in significant risk for any participation.

Both the state and interested organizations have focused on means of addressing the barrier in recent years. For example, the Forest Stewardship Guild (FSG) has sought to establish a new insurance product with Lloyds of London. However, that effort has not yet been successful. Cited reasons include (a) concerns from the insurers that the market is too small and unpredictable for them to be comfortable about the potential risk, (b) disagreement among interested parties as to whether to use a per-burn or per-acre pricing model, and (c) concerns that the potential price for such a product (whether per-burn or per-acre) would be unsustainable for landowners, organizations, and burn bosses. Larger uncertainties in the insurance market as a result of COVID-19 and related business interruption claims have also stalled conversations. FSG is hoping to reengage in these conversations in 2021.

133 Ranchers and farmers may still have coverage under their farm and ranch policies as agricultural producers.

FSG is also evaluating the possibility of setting up a "captive" or specific insurance company set up to issue intentional burn insurance. FSG believes that a captive insurance company may be legally and financially feasible, provided they can secure at least \$10 million in initial funding.

The Nature Conservancy is also actively engaged in this work. In early 2021, they engaged insurance and risk experts at Marsh, Inc. to gather data on intentional burns, rates of escape, policy coverage, and covered losses to understand the scope and parameters of the likely market. They are also evaluating the possibility of California stepping into the market, likely as a backstop for catastrophic claims (i.e., greater than \$1 to 3 million).

The Department of Insurance, together with the Forest Management Task Force, was directed to "develop recommendations for the implementation of an insurance pool or other mechanism for prescribed burn managers that reduces the cost of conducting prescribed fire while maintaining adequate liability protection for lives and property when conducting prescribed burns."¹³⁴ However, the state ultimately concluded that the current market for prescribed fire insurance in California is too small and too cyclical to make a common pool economical at this juncture.

RECOMMENDED CHANGES

- Develop a state-backed insurance pool. Burners could purchase insurance from the state, which would then cover attorneys' fees and damages awards. Work nationwide or with other western states to ensure that the market is sufficiently large, particularly to withstand drought-related cycles of less intentional fire activity. Continue to build partnerships with landowners and land managers—including non-traditional allies like utility companies—to grow the market for intentional fire insurance.
- Provide a state-backed claims pool or insurance pool for extraordinary claims (i.e., claims above \$1 million or some other number). Unfortunately, insurance experts indicate that insurers are more concerned about paying the amount up to the first million, so an extraordinary claims pool may still leave private burners without primary insurance. However, the state may be more willing to provide this type of coverage than a "first million" policy.

- Work with the private sector and/or philanthropic sector to establish a captive insurance company that could issue intentional burn insurance.
- Develop a state claims pool and require people hurt or damaged by an escaped intentional fire to seek compensation from the pool, rather than from the burner. This could be coupled with a shift to gross negligence, where claims would go to the state for damage caused by ordinance negligence, and to the burner for damage caused by gross negligence.

134 Pub. Resources Code § 4500.



ENVIRONMENTAL REVIEW UNDER THE CALIFORNIA ENVIRONMENTAL QUALITY ACT

For certain burns, the completion of environmental review under the California Environmental Quality Act (CEQA)¹³⁵ creates a significant impediment.¹³⁶ CEQA is California's environmental review statute, which requires all public agencies to evaluate the potential environmental impacts of their actions in advance of decisionmaking, and to either mitigate or avoid any significant environmental impacts if feasible.¹³⁷ Typically, CEQA compliance becomes a concern for any burn that is either undertaken by or funded by CAL FIRE or another state or local agency, such as the California Department of Conservation or the California Office of Emergency Services.¹³⁸ Notably, because CAL FIRE has categorized the issuance of LE-62a, LE-5, and LE-7 permits as "ministerial," a permitted prescribed fire undertaken without CAL FIRE or other state and local assistance generally will not be subject to CEQA review.¹³⁹

¹³⁹ Pub. Resources Code § 21080(b)(1) ("Ministerial projects" are not subject to CEQA); Brian Mattos, CAL FIRE Prescribed Fire Planning & Permitting Power Point ("The LE-5 and LE-7 are non-discretionary and don't require CEQA.").



¹³⁵ Pub. Resources Code § 21000 et seq. While burns involving federal agencies may face similar barriers with respect to the National Environmental Policy Act (42 U.S.C. § 4321 et seq.), this topic is not discussed in this paper.

¹³⁶ The Watershed Center's January 2020 Report identified environmental review as a "top barrier" for about a quarter of organizations interviewed. See Watershed Center, Investment Opportunities for Increasing Forest and Fire Management Capacity California (January 2020).

¹³⁷ E.g., Pub. Resources Code § 21002.

¹³⁸ Pub. Resources Code § 21065 (A "project" requiring CEQA compliance includes both "[a]n activity directly undertaken by any public agency" or "[a] n activity undertaken by a person which is supported, in whole or in part, through contracts, grants, subsidies, loans, or other forms of assistance from one or more public agencies."].

CAL FIRE and other agencies can meet their CEQA obligations through a number of different procedural routes, including use of categorical exemptions, reliance on the 2019 California Vegetation Treatment Program (CalVTP) EIR, use of National Environmental Policy Act (NEPA) documents, or preparation of a stand-alone mitigated negative declaration (MND) or environmental impact report (EIR). Each option is discussed in turn.

CATEGORICAL EXEMPTION

Categorical Exemptions provide one of the quickest paths to CEQA compliance, but they are not a complete solution. CEQA requires the Secretary for Resources to develop "a list of classes of projects that have been determined not to have a significant effect on the environment" and are therefore exempt from CEQA.¹⁴⁰ Pursuant to this requirement, the Natural Resources Agency has developed a list of 33 "classes" of projects that may qualify for categorical exemptions.¹⁴¹

Intentional burns may fall within two of these classes. First, Class 1 includes the "operation, repair, maintenance, ... or minor alteration of existing public or private ... topographical features, involving negligible or no expansion of existing or former use."¹⁴² CAL FIRE and the Department of Parks and Recreation have both relied on this exemption for intentional burns that involve the maintenance of existing fuel breaks or other "topographical features."¹⁴³¹⁴⁴ Likewise, CAL FIRE's CEQA implementing regulations recognize the potential use of this exemption for maintenance of "[f]uel and firebreaks and other fire defense improvements."¹⁴⁵ This Class would not be appropriate, however, for intentional burns in new areas.¹⁴⁶

Second, Class 4 includes "minor public or private alternations in the conditions of land ... and/or vegetation which do not involve removal of healthy, mature, scenic trees except for forestry or agricultural purposes."¹⁴⁷ On its face, this Class arguably could be used for a number of intentional fire activities. However, in providing examples of Class 4 activities, the CEQA Guidelines have circumscribed its utility. Specifically, the CEQA Guidelines provide that one example of a Class 4 activity is:

Fuel management activities within 30 feet of structures to reduce the volume of flammable vegetation, provided that the activities will not result in the taking of endangered, rare, or threatened plant or animal species or significant erosion and sedimentation of surface waters. This exemption shall apply to fuel management activities within 100 feet of a structure if the public agency having fire protection responsibility for the area has determined that 100 feet of fuel clearance is required due to extra hazardous fire conditions.¹⁴⁸

While the examples provided in the CEQA Guidelines do not constitute the entire universe of activities for which the Class 4 exemption may be appropriate, this example does provide some evidence of how the term "minor" should be interpreted – i.e., relatively small areas close to existing structures. If the application of the Class 4 categorical exemption to a larger intentional burn was challenged, a court would look at this example and might find that the two activities are not sufficiently similar to warrant application of the exemption.

Nevertheless, CAL FIRE and other state agencies have been relying on the Class 4 Categorical Exemption for intentional burns. For example, between 2018 and 2020, CAL FIRE filed notices of exemption for at least a half-dozen prescribed burns ranging in size between 7 acres and 261 acres, all relying on the Class 4 exemption.¹⁴⁹ Burners also report that CAL FIRE has occasionally applied categorical exemptions

¹⁴⁹ See, e.g., https://ceqanet.opr.ca.gov/2013068416; https://ceqanet.opr.ca.gov/2019048281/2; https://ceqanet.opr.ca.gov/2020060026/2; https:// ceqanet.opr.ca.gov/2020110153/2.



¹⁴⁰ Pub. Resources Code § 21084.

¹⁴¹ CEQA Guidelines §§ 15301-33. The CEQA Guidelines, which are CEQA's implementing regulations, can be found at Cal. Code Regs., tit. 14, § 15000 et seq.

¹⁴² CEQA Guidelines § 15301.

¹⁴³ Most state agencies promulgate regulations explaining how the agency will comply with CEQA. As part of these regulations, most agencies—including CAL FIRE—explain how the different categorical exemptions will apply to their specific activities.

¹⁴⁴ E.g., https://ceqanet.opr.ca.gov/2019100246/2.

¹⁴⁵ Cal. Code Regs., tit. 14, § 1662.1.

¹⁴⁶ While Class 1 includes efforts to operate or maintain the landscape to a "former use," former has generally been interpreted as the recent past. See California Natural Resources Agency, Final Statement of Reasons for Regulatory Action, Amendments to the State CEQA Guidelines (Nov. 2018), at 91-92. Class 1 is not likely appropriate for prescribed burns that return the landscape to a historical, pre-suppression state.

¹⁴⁷ CEQA Guidelines § 15304.

¹⁴⁸ CEQA Guidelines § 15304(i).

for projects that include multiple burn units adding up to nearly 2,000 acres, though such large projects are rarer.

One impediment to the efficient use of these categorical exemptions stems from the fact that categorical exemptions are not absolute. Specifically, if an agency determines that a proposed activity falls within one of the classes, it still must conduct additional analysis to determine if one of the "exceptions to the exemptions" apply, such that additional CEQA analysis is required. These exceptions include:

- For the Class 4 exemption, projects that are located in a place that may impact "an environmental resource of hazardous or critical concern."¹⁵⁰ For this reason, agencies need to review maps and plans to determine if an intentional burn would impact designated critical habitat, environmentally sensitive habitat areas, and the like.
- Projects that "may cause a substantial adverse change in the significance of a historical resource."¹⁵¹ Under CEQA, historical resource includes any resources eligible for listing on the California Register of Historical Resources, including many archaeological resources.¹⁵² For this reason, agencies must pay particularly attention to ensuring that otherwise exempt projects will not impact archaeological resources.
- Any project "where there is a reasonable possibility that the activity will have a significant effect on the environment due to unusual circumstances."¹⁵³ Under this catchall provision, agencies must pay attention to the ways that a proposed project may be "unusual" and determine whether further analysis is warranted.

Depending on culture and risk tolerance, different agencies will have different analysis and documentation requirements for these exceptions. Burners report that CAL FIRE generally requires biological resource mapping and archaeological surveys, even for categorical exceptions. This level of analysis is a conservative approach, which can be expensive and time consuming for applicants. Other agencies—such as Resource Conservation Districts (RCDs) may be more willing to apply categorical exemptions based on knowledge of the applicant and/or application of conditions intended to protect potential resources.

CAL FIRE VEGETATION TREATMENT PROGRAM PROGRAMMATIC EIR

At the end of 2019, the Board of Forestry and Fire Protection adopted the California Vegetation Treatment Program (CalVTP) and its associated Programmatic Environmental Impact Report (PEIR). The CalVTP was prepared to support the significant expansion of CAL FIRE's vegetation treatment activities, including prescribed fire, to reach approximately 250,000 acres treated annually. 154 If fully implemented, CalVTP would result in a significant increase in treatment; in 2019, only an average of 33,000 acres were being treated annually.¹⁵⁵ Notably, these figures remain far below the historic extent of burning in the state, which is estimated at 4.5 to 12 percent of the state's lands.¹⁵⁶

One significant goal of the CalVTP is to further streamline CEQA review for CAL FIRE and other state and local agencies.¹⁵⁷ Specifically, the CalVTP PEIR is intended to function as a sort of "umbrella" environmental review – if later activities fall within the scope of the PEIR, then no new environmental documents are required.¹⁵⁸ CAL FIRE believes that this will "facilitate an increase in the pace and scale of project approvals in a manner that includes environmental protections in compliance with CEQA."¹⁵⁹ The Public Resources Code directs CAL FIRE to use this document moving forward.¹⁶⁰

- 152 Pub. Resources Code § 21084.1.
- 153 CEQA Guidelines § 15300.2(c).
- 154 CalVTP FPEIR at ES-2. The 250,000-acre goal is intended to cover CAL FIRE's portion of the 500,000-acre annual non-federal treatment goal established by Executive Order B-52-18.

- 156 S. Stephens et al., Prehistoric fire area and emissions from California's forest, woodlands, shrublands, and grasslands, Forest Ecology and Management (2007).
- 157 CalVTP FPEIR at ES-2.
- 158 CEQA Guidelines § 15168(c)(2) (If the agency determines there is no new, relevant information, "the agency can approve the activity as being within the scope of the project covered by the program EIR, and no new environmental document would be required.")
- 159 CalVTP FPEIR at ES-2.
- 160 Pub. Resources Code § 4483.

¹⁵⁰ CEQA Guidelines § 15300.2(a).

¹⁵¹ CEQA Guidelines § 15300.2(f).

¹⁵⁵ *Id*.

The first step in understanding whether a particular intentional burn is "within the scope" is to determine whether the burn meets the geographic, goal, and treatment type requirements. The CaIVTP PEIR only covers 20.3 million acres within the 31-million-acre State Responsibility Area; these acres were determined to be the "treatable landscape."¹⁶¹ These areas can be viewed <u>online</u>.¹⁶²

Next, the CalVTP PEIR includes vegetation treatments aimed at three broad goals: reducing fuel within the 10.1-million-acre Wildland Urban Interface (WUI), creating strategic fuel breaks, and restoring ecological function.¹⁶³ Intentional burns that do not meet these goals, as defined by CAL FIRE, will not qualify.

Finally, the CalVTP is clear that intentional burns—including both pile and broadcast burning—are "within the scope."¹⁶⁴ Intentional burns can also be used in conjunction with other treatment options, such as mechanical treatment, manual treatment, prescribed herbivory, and herbicides.¹⁶⁵

If an intentional burn is "within the scope," the lead agency¹⁶⁶ must then ensure compliance with numerous "Standard Project Requirements" in order to rely on the CalVTP PEIR. These Standard Project Requirements are long, detailed, and at times quite onerous: in order to conclusively demonstrate that the CalVTP program as a whole would result in mostly less-than-significant environmental impacts, the CalVTP imposes significant requirements on each intentional burn.

Specifically, the following are Standard Project Requirements¹⁶⁷ applicable to each intentional fire, among many others:

- Biological survey (within one year of burn), including protocol level surveys reconnaissance survey indicates possible presence of special status species
- Biological resource training

- Archaeological records search
- Archaeological survey and report
- Cultural resource training
- For chaparral or coastal sage scrub, treatment design to avoid type conversion
- Geological evaluation, for steeply sloped areas
- Erosion monitoring
- Special protections for riparian, watercourse, and lake protection zones

On balance, most burners are likely taking into account these issues through their burn plans or other project design. However, the CalVTP imposes the specific and mandatory ways of addressing each of these issue in order to qualify for CEQA clearance.

Moreover, the lead agency must also evaluate whether the intentional burn would "(1) cause any new impact, (2) cause any substantially more severe significant impact than was addressed in the PEIR, or (3) reveal a mitigation measure or alternative that is substantially different from those in the PEIR or found infeasible in the PEIR," by completing a checklist for each impact area.¹⁶⁸ The lead agency must also evaluate whether any of the PEIR's mitigation measures—which are separate from the Standard Project Requirements-are applicable to the project. Some of these mitigation measures are significant, including implementation of specific burning methods to reduce greenhouse gas (GHG) emissions, the use of exhaust emission reduction technologies for equipment, and specific mitigation for potential impacts to special status species and their habitat.¹⁶⁹ Finally, project proponents must submit data to CAL FIRE regarding the planned burns.¹⁷⁰

Comparing the Standard Project Requirements with prior CAL FIRE categorical exemptions, it appears that the CaIVTP program may actually increase the amount of environmental analysis that must be done to approve an

- 167 CalVTP FPEIR at PD-3, pp. 37-71.
- 168 CalVTP FPEIR at PD-3, pp. 1, 15-36.
- 169 CalVTP FPEIR at PD-3, pp. 72-97.
- 170 CalVTP FPEIR at PD-3, p. 8.

¹⁶¹ CalVTP FPEIR at ES-3.

¹⁶² See https://calfire-forestry.maps.arcgis.com/apps/webappviewer/index.html?id=78782787ae4d459e8cb313141a5c41be.

¹⁶³ CalVTP FPEIR at ES-3.

¹⁶⁴ CalVTP FPEIR at ES-3.

¹⁶⁵ CalVTP FPEIR at ES-3.

¹⁶⁶ The lead agency is likely CAL FIRE, but other agencies may rely on the PEIR to complete their CEQA compliance for projects "within the scope" as well.

intentional burn. Ultimately, the success of the CalVTP program hinges on whether CAL FIRE and other lead agencies can process such projects more quickly by standardizing environmental review. At this time, burners report that CAL FIRE does not appear to have sufficient Unit Foresters or Archaeologists on staff that are available or knowledgeable enough to do this work.

Notably, only four CalVTP projects were approved in 2020, with under 5,000 total acres treated and broadcast burning on only 250.¹⁷¹ The largest project's environmental documentation—for the Yuba Foothills Healthy Forest Project on behalf of the Yuba County Water Agency—was prepared by Ascent Environmental, a private consulting company that also prepared the CalVTP and its PEIR.¹⁷²

FEDERAL ENVIRONMENTAL REVIEW

For projects on federal land, CEQA lead agencies may also rely on existing NEPA documentation. The Good Neighbor Authority (GNA) allows federal forest agencies to enter into agreements with state forest agencies, counties, and federally recognized Tribes to carry out restoration projects on federal lands.¹⁷³ The GNA generally operates via cooperative agreements, which provide federal funds to non-federal partners to provide restoration services on Forest Service or BLM land. Federal law applies to these projects, including the National Forest Management Act, any applicable Forest Land Management Plan, and the National Environmental Policy Act. Thus, for GNA projects, NEPA review will be completed by the federal agency.

In recognition of the state or local agency's limited role—providing funding and staffing—and the existence of federal environmental review, the state has provided a statutory CEQA exemption for such agencies, even if the state agency or county issues permits or provide other approval.¹⁷⁴ Consequently, no CEQA compliance is required. Other joint state and federal projects may also rely on streamlined environmental review. If both state and federal agencies must make discretionary decisions for a particular burn, then the agencies are instructed to work together to reduce duplication and streamline the process.¹⁷⁵ Depending on the project and partnership, stage agencies may largely rely on existing federal documents, or vice versa.

MITIGATED NEGATIVE DECLARATIONS AND ENVIRONMENTAL IMPACT REPORTS

Finally, to the extent an intentional burn requires CEQA clearance but does not qualify for a categorical exemption, for streamlining under the CalVTP PEIR, or for joint federal-state review, CAL FIRE or the other lead agency can undergo environmental review.

Lead agencies typically have two options. First, if there is "no substantial evidence, in light of the whole record before the agency, that the project may have a significant effect on the environment," then the lead agency may prepare a negative declaration.¹⁷⁶ If mitigation measures are necessary to ensure that the project does not have a significant effect on the environment, then the lead agency may prepare a mitigated negative declaration, which makes such measure mandatory.¹⁷⁷ Mitigated negative declarations are often significantly shorter and less complex than EIRs, and therefore are less time consuming and expensive to prepare. Mitigated negative declarations require a public comment period,¹⁷⁸ though unlike an EIR, no responses to comments are required before approval.

If the proposed project may have a significant effect on the environment that cannot be mitigated to lessthan-significant, then the lead agency must prepare a full EIR.¹⁷⁹ EIRs must include robust discussions of potential impacts and mitigation measures,¹⁸⁰ as well as consideration of alternatives,¹⁸¹ cumulative impacts,¹⁸²

^{171 &}lt;u>https://bof.fire.ca.gov/projects-and-programs/calvtp/approved-projects-environmental-documentation/.</u>

^{172 &}lt;u>https://bof.fire.ca.gov/media/ofwhscr5/ywa-psa-addendum_101220_id2020-9.pdf</u>.

¹⁷³ The 2018 Farm Bill extended the GNA to federally recognized Tribes.

¹⁷⁴ Pub. Resources Code § 4799.05(d).

¹⁷⁵ E.g., CEQA Guidelines § 15226.

¹⁷⁶ CEQA Guidelines § 15070(a).

¹⁷⁷ CEOA Guidelines § 15071(e).

¹⁷⁸ CEQA Guidelines § 15073(a).

¹⁷⁹ Pub. Resources Code § 21082.2(d).

¹⁸⁰ CEQA Guidelines §§ 15126.2, 15126.4.

¹⁸¹ CEQA Guidelines § 15126.6.

¹⁸² CEQA Guidelines § 15130.

and other mandatory topics. EIRs must be circulated for public comment, and lead agencies are required to prepare comprehensive responses to such comments prior to action on the proposed project.¹⁸³ The preparation of an EIR is complex, expensive, and long—most EIRs take at least six to nine months to prepare and consider, and often significantly more.

BARRIER: Environmental review is complex, timeconsuming, and expensive

Despite efforts to streamline environmental review for intentional burns, compliance with CEQA remains a significant barrier to efficiently expanding the use of intentional fire. Burners report that the time and expenses spent completing environmental review and associated analysis often exceed the cost of implementation, and result in no significant substantive changes to the burn plan, smoke plan, or other standard efforts to mitigate potentially significant environmental impacts. Private burners also report a disincentive for seeking CAL FIRE grants or other partnerships, given that CAL FIRE involvement also brings the associated environmental review.

RECOMMENDED CHANGES

Pursue a statutory exemption from the Legislature for cultural burning and/or prescribed fire. Unlike categorical exemptions, which are established by the Natural Resources Agency and subject to the "exceptions" discussed above, statutory exemptions allow agencies to pursue discretionary projects without any type of CEQA analysis. CEQA contains numerous statutory exemptions, both for specific, controversial projects¹⁸⁴ and for broader categories of projects-like affordable housing¹⁸⁵—where the state has an interest in expedited expansion. The exemption could be limited to cultural burning, or contain restrictions on the use of prescribed fire-such as size, location, use of a state certified burn boss and/or receipt of CAL FIRE and air quality permits, or adherence to specific mitigation measures-to provide some assurances that the exempt prescribed fires will be conducted in an environmentally responsible manner. Care must be given to ensure that any restrictions do not overly

burden the use of the exemption or infringe on tribal sovereignty.

- ➤ The Secretary of Resources should modify the examples contained within the CEQA Guidelines for Class 1, Class 4, and Class 7 to better facilitate the applications of such exemptions to intentional burning. In particular, the fuel modification example provided as part of the Class 4 exemption¹⁸⁶ could be modified to include larger or more remote intentional fires.
- The Legislature (or the Secretary of Resources) should modify the statute (or the CEQA Guidelines) to allow tribal authority over all necessary archaeological and/ or cultural resource analysis for cultural burns or prescribed fires. If the appropriate California Native American Tribe approves the activity (with or without conditions), no further analysis would be required.
- CAL FIRE should amend its CEQA implementing regulations¹⁸⁷ to better direct its staff to use categorical exemptions for intentional fire projects. Specific guidance could be codified around the size, location, and type of intentional burn projects that should be considered for categorical exemptions.
- CAL FIRE and/or the Legislature should devote significant resources to hiring and training CAL FIRE staff to quickly and efficiently use the CalVTP PEIR process. Likewise, additional funding should be made available to Tribes, cultural fire practitioners, and other burners to allow them to conduct the analysis necessary to complete the CalVTP process, without relying on CAL FIRE.
- The Legislature should allocate grant money differently, either directly to non-profit organizations or to other agencies (like RCDs) that may be more willing to rely on categorical exemptions without extensive documentation.
- CAL FIRE should propose, for certification by the Secretary of the Resources Agency, a "Certified Regulatory Program" for intentional fire (and potentially other forms of vegetation management). Certified regulatory programs allow state agencies to comply with CEQA by conducting alternate forms of environmental review when issuing a "lease, permit, license, certificate, or other entitlement for

¹⁸³ CEQA Guidelines § 15088.

¹⁸⁴ E.g., Pub. Resources Code §§ 21080(b)(7) (hosting Olympic games), 21080.01-03, .07 (certain prison facilities), 21080.05 (Bay Area rail service).

¹⁸⁵ E.g., Pub. Resources Code §§ 21159.21, 21159.22, 21159.23, 21080.17.

¹⁸⁶ CEQA Guidelines § 15304(i).

¹⁸⁷ Cal. Code Regs., tit. 14, § 1660 et seq.

use."¹⁸⁸ Through the creation of a Certified Regulatory Program, CAL FIRE could develop a tailored mechanism for burn permit review that may be faster and less expensive than either a categorical exemption or a "within the scope" finding for the CalVTP EIR. Notably, all certified regulatory programs must be established to ensure that CEQA's substantive requirements are met; agencies are only permitted to deviate from procedural requirements. Timber harvesting operations are regulated under a certified regulatory program,¹⁸⁹ so the Department of Forestry already has some potentially relevant experience.

- Alternately, the Public Resources Code should be modified to allow Tribes to adopt their own certified regulatory programs to manage cultural burns and prescribed fire within their ancestral territories.
- CAL FIRE should fund regional programmatic EIRs for private lands for the practice of prescribed burning specifically. Such programmatic EIRs could be more specific than the CalVTP and offer more streamlined tiering.

189 CEQA Guidelines § 15251(a).

Modifications should be sought to classify cultural burning as part of a landscape's "baseline" condition, such that cultural burns do not amount to a "project" under CEQA requiring environmental review. Such modifications could be sought through amendments to the Public Resources Code, CEQA guidelines, agencyspecific CEQA regulations, or litigation. Likewise, agencies and consultants conducting environmental review should be better trained on the historical presence of fire in most Californian ecosystems, such that analysis better takes into account these historic baselines and fire-adapted ecosystems. Continue to expand the use of combined NEPA/CEQA review. Agencies should be given additional leeway to rely on equivalent state and/or federal analysis already completed. Reviews should be coordinated to reduce the need for duplicative analysis and to streamline the process, rather than making it more complicated.

¹⁸⁸ Pub. Resources Code § 21080.5(b)(1).



AGENCY CULTURE

BARRIER: Longstanding agency culture continues to impede use of prescribed fire

Both burners and existing literature report the dampening effect that existing agency culture has on expanding prescribed fire in multiple contexts: on public lands by agencies, on private lands in partnership with agencies, and on private lands with authorization by agencies. This culture issue is reported at the Forest Service, the Bureau of Land Management, the Bureau of Indian Affairs, and CAL FIRE.

Reported issues can be grouped in a few ways. First, using the same staff for fire suppression and prescribed fire has not been effective. Crews report feeling burned out and unmotivated after long fire suppression seasons, and an ever-longer fire season has exacerbated this issue. Suppression training requirements, use of local workforce, and loss of seasonal workers means that there is insufficient staffing when prescribed burn windows are available.¹⁹⁰ Second, internal agency structures disfavor work on prescribed fire. Employees are rewarded for fire suppression activities, with career advancement and public accolades. On the other hand, many employees view prescribed fire as risky, with the potential for an escaped burn to raise questions of personal and agency liability.¹⁹¹ Agency culture has created minimal consequences for employees that fail to support the program of work, including engaging in prescribed burning.

Third, agencies have not invested in adequate training or education on prescribed fire. Private burners report that agency staff use private training burns to become more knowledgeable, but only if individual employees are motivated to do so. Private burners also report that CAL FIRE staff can lack knowledge about permitting and other issues for private burners.

Finally, existing agency structure creates more existential questions. We are asking the same agencies that created the problem—via fire suppression and other

¹⁹⁰ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018) (discussing issue within USFS).

¹⁹¹ C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).

forest management techniques—to be responsible for the solution. Yet the agencies have largely failed to acknowledge that their past and present decisions play a large role in the difficult circumstances we currently face. Without such acknowledgement, cultural change may be difficult.192

RECOMMENDED CHANGES

- Create new intentional fire training centers. Currently, there is one National Interagency Prescribed Fire Training Center, but it is located in Tallahassee, Florida. One or more training centers in California would create agency employees ready and able to create cultural change. These training centers should include leadership from Tribes and be interagency by design. Consider establishing an indigenous-lead cultural burning training center in particular.
- Require agencies to have or expand dedicated prescribed fire or fuel reduction crews. The same people should not be used for fire suppression and prescribed fire activities. Implement policies to improve retention within these dedicated crews.
- Invest in regional prescribed burn "cadres" or "modules" that could facilitate complex burns across a variety of landscapes within their regions. Such teams should be interagency and/or public-private partnerships. Consider using the All Hands All Lands model first developed in New Mexico, and being piloted in northwest California as a starting place.
- Increase incentives for agency personnel planning and implementing prescribed burns.
- Improve the ability of agencies to partner with cultural fire practitioners, non-profit organizations and other agencies.

¹⁹² C. Schultz et al., Prescribed Fire Policy Barriers and Opportunities, Ecosystem Workforce Program Working Paper Number 86 (Summer 2018).



RESOURCES

BARRIER: Private burners lack sufficient resources

Perhaps unsurprisingly, private burners also express concern about the relative lack of funding available to conduct additional intentional burns. Specifically, funding is needed to purchase equipment, engage personnel (especially trained personnel, including burn bosses), provide adequate training, complete environmental review, prepare burn and smoke plans, obtain necessary permits, and secure insurance. Current estimates find that the cost of implementing an intentional fire range from \$100 to \$1,000 per acre of treated forest.¹⁹³

While this cost can be significantly less than other alternatives (such as mechanical or manual thinning), it can still be quite significant, especially as the need for burning across larger landscapes continues to increase. Indeed, nearly half of the organizations included in the Watershed Center's Investment Opportunities report indicate that "inadequate amounts of funding for forest and/or fire projects, programs, and work was one of their top three barriers to this work."¹⁹⁴ As discussed above, one notable concern about funneling funding through CAL FIRE or other agencies is the resulting need for CEQA compliance.

POTENTIAL SOLUTIONS

- Provide significant funding to non-profit organizations, Tribes, cultural fire practitioners, and landowners to implement intentional burns and increase local capacity. Funding programs should ensure that all categories of costs identified above can be covered.
- Funding should be directed through state agencies prepared to handle streamlined CEQA compliance (such as RCDs) or through other creative mechanisms.

¹⁹³ M. Burke et al., "Managing the growing cost of wildfire" Stanford Institute for Economic Policy Research, Policy Brief (October 2020).

¹⁹⁴ Watershed Center, Investment Opportunities for Increasing Forest and Fire Management Capacity in California (January 2020).



AREAS WARRANTING FUTHER RESEARCH

While we have attempted to be comprehensive, this paper does not address all barriers to increasing the use of intentional fire. Some of the potential topics warranting further research and policy recommendations include National Environmental Policy Act review, federal and state Endangered Species Act clearance, agency funding issues, public misunderstanding and fear, and lack of sufficient technical experts to meet demand.





CONCLUSION

The time for bold action is now. We acknowledge that many individuals and agencies have begun the complex and difficult work of undoing decades of fire exclusion and suppression, and centuries of racism, genocide, and mistreatment of California's Indigenous people. But the last few fire seasons have made clear that our time is short and the need is great. We must take this opportunity and opening to not just shift on the margins, but fundamentally shift our approach to intentional fire.



APPENDIX A: AIR QUALITY PERMIT COSTS

DISTRICT	BURN TYPE	PERMIT BASE COST	ADDITIONAL PERMIT Costs	SMP REQUIRED	SMP COST
Amador	Residential				
	Rx or large piles	\$30.00	None	Yes (PFIRS)	None
	Rx or large piles	\$50.00	None	Yes (PFIRS)	None
	Rx		NA	Yes (PFIRS)	None
Antelope Valley	Residential	Through fire dept.	None	No	
	Residential	Not allowed			
	0-50ac Rx Fire	\$138.00	None	Yes	\$602.00
Bay Area AUMD	50-150ac	\$138.00	None	Yes	\$816.00
	>150ac	\$138.00	None	Yes	\$1,062.00
	Rx	\$140.00	\$1.00 per ac	Yes (PFIRS)	None
Butte	Rx <10ac, over 1,000', <1 ton emissions	\$30.00	\$0.75 per ac	No	
	Hazard Reduction			No	
	<5ac			No	
Calaveras County APCD	5-10ac	\$12.00	None	No	
	>10ac	\$12.00	None	Yes	None
Colusa	Rx	None	\$3.35 per ac	Yes (PFIRS)	None
	Residential	None	None	No	
Eastern Kern APCD	Rx			Yes (PFIRS), for burns over 10 ac or more than 1 ton	None
El Dorodo County AOMD	<10ac	None	None	No	
	>10ac	None	None	Yes	None
Feather River AQMD	Rx / Ag	\$42.00	\$0.42 per ac after 20ac	Yes	None
	<10ac	\$40.00	None	Yes (PFIRS)	None
	11-50	\$110.00	None	Yes (PFIRS)	None
	51-100	\$160.00	None	Yes (PFIRS)	None
Clopp County APCD	101-200	\$210.00	None	Yes (PFIRS)	None
	201-500	\$360.00	None	Yes (PFIRS)	None
	501-750	\$510.00	None	Yes (PFIRS)	None
	751-1000	\$760.00	None	Yes (PFIRS)	None
	1001+	\$1,010.00	None	Yes (PFIRS)	None
Great Basin Unified APCD	Rx			Yes	
Imperial County APCD	<40 ac	\$84.50	None		
Imperial county AFGD	>40 ac	\$84.50	\$1.50 per ac		
l ako	<1ac				
	>1ac	\$28.00	None	Yes	None
Lassen County APCD	<10ac	None		No	
	>10ac			Yes	\$122.21
Mariposa	Agency	\$175.00	\$1.75 per ac	Yes	None
	Private Landowner / Hazard Reduction	\$25.00	None	No	
Mendocino	50 tons or more	\$17.00	None	Yes	\$110.00
Modoc		None	None	Yes, for burns over 40 ac	None
Monterey	Rx burn	None	None	Yes	None



DISTRICT	BURN TYPE	PERMIT BASE Cost	ADDITIONAL PERMIT Costs	SMP REQUIRED	SMP COST
	Residential	\$20.00		Yes	\$65.00
	<1ac	\$40.00		Yes	\$65.00
North Coast	1-10ac	\$80.00		Yes	\$65.00
	100-300ac	\$250.00		Yes	\$65.00
	>300ac	\$1,250.00		Yes	\$65.00
	Residential	None		No	
	<10ac	\$72.95	None	No	
North Sierra	>10ac	\$72.95	\$2.43 per ac for forest management; \$1.22 per ac for rangeland or wildland vegetation management	Yes	None
	Residential	\$20.00		No	
Northern Sonoma	Rx (with SMP)	\$250.00		Yes	
	Rx (SMP exempt)	\$100.00		No	
Placer	Forest Management	\$86.17	\$2.59 per ac for burns 0-500 ac	Yes	\$145.38
Son looguin Unified	Piles		\$4.20 per ac	Yes (PFIRS)	None
San Joaquin Unitied	Broadcast		\$7.00 per ac	Yes (PFIRS)	None
	Residential	None			
Shooto	Hazard Reduction	\$15.00			
Shasta	0-10ac	\$35.00		No	
	>10	\$35.00	\$0.50 per ac	Yes (PFIRS)	\$35.00
Siekiyou	<10ac	None	None	No	
JISKIYUU	>10ac	None	None	Yes	None
South Coast	Rx	None	None	Yes (PFIRS)	\$161.25
	Rx	\$30.00	\$0.50 per ac	Yes	None
	50-100ac_ag	\$61.75		No	
Tehama	100-200ac_ag	\$119.25		No	
	>200ac_ag	\$178.00		No	
	Non-Ag Rx	None	\$0.50 per ac	Yes	\$30.00
Mojave	>10ac	None	None	No	
	<10 ac	None	None	Yes	None
Sacramento					
San Diego					
	>10ac or 100 tons	\$50.00	None	No	None
San Luis Obispo	<10ac or 100-500 tons	\$125.00	None	Yes	None
	100-250ac or 500-1000 tons	\$185.00	None	Yes	None
	<250ac or 1000 tons	\$250.00	None	Yes	None
Santa Barbara	Rx	None	None	Yes	None
Tuolomne				Yes (PFIRS)	
Ventura					
Yolo-Solano	Rx	\$30.00	\$1.00 per ac	Yes	None

Data collected Spring 2020

"--" indicates data are not available



APPENDIX B: GROSS LIABILITY STANDARDS IN OTHER STATES

FLORIDA

Fla. Stat. Ann. § 590.125

- (1) Definitions.— As used in this section, the term:
 - (a) "Certified pile burner" means an individual who successfully completes the pile burning certification program of the Florida Forest Service and possesses a valid pile burner certification number.
 - (b) "Certified pile burning" means a pile burn conducted in accordance with a written pile burning plan by a certified pile burner.
 - (c) "Certified prescribed burn manager" means an individual who successfully completes the certified prescribed burning program of the Florida Forest Service and possesses a valid certification number.
 - (d) "Certified prescribed burning" means prescribed burning in accordance with a written prescription conducted by a certified prescribed burn manager.
 - (e) "Contained" means that fire and smoldering exist entirely within established or natural firebreaks.
 - (f) "Completed" means that for:
 - Broadcast burning, no continued lateral movement of fire across the authorized area into entirely unburned fuels within the authorized area.
 - 2. Certified pile burning or pile burning, no visible flames exist.
 - 3. Certified pile burning or pile burning in an area designated as smoke sensitive by the Florida Forest Service, no visible flames, smoke, or emissions exist.
 - (g) "Gross negligence" means conduct so reckless or wanting in care that it constitutes a conscious disregard or indifference to the life, safety, or rights of persons exposed to such conduct.
 - (h) "Pile burning" means the burning of silvicultural, agricultural, land-clearing, or tree-cutting debris originating onsite, which is stacked together in a round or linear fashion, including, but not limited to, a windrow. Pile burning authorized by the Florida Forest Service is a temporary procedure, which operates on the same site for 6 months or less.

- (i) "Pile burn plan" means a written plan establishing the method of conducting a certified pile burn.
- (j) "Prescribed burning" means the application of fire by broadcast burning for vegetative fuels under specified environmental conditions, while following appropriate measures to guard against the spread of fire beyond the predetermined area to accomplish the planned fire or land management objectives.
- (k) "Prescription" means a written plan establishing the conditions and methods for conducting a certified prescribed burn.
- "Smoldering" means the continued consumption of fuels, which may emit flames and smoke, after a fire is contained.
- (m) "Yard trash" means vegetative matter resulting from landscaping and yard maintenance operations and other such routine property cleanup activities. The term includes materials such as leaves, shrub trimmings, grass clippings, brush, and palm fronds.
- (2) Noncertified burning.-
 - (a) Persons may be authorized to broadcast burn or pile burn pursuant to this subsection if:
 - 1. There is specific consent of the landowner or his or her designee;
 - 2. Authorization has been obtained from the Florida Forest Service or its designated agent before starting the burn;
 - 3. There are adequate firebreaks at the burn site and sufficient personnel and firefighting equipment for the containment of the fire;
 - 4. The fire remains within the boundary of the authorized area;
 - 5. The person named responsible in the burn authorization or a designee is present at the burn site until the fire is completed;
 - 6. The Florida Forest Service does not cancel the authorization; and
 - 7. The Florida Forest Service determines that air quality and fire danger are favorable for safe burning.
 - (b) A new authorization is not required for smoldering that occurs within the authorized burn area unless

new ignitions are conducted by the person named responsible in the burn authorization or a designee.

- (c) Monitoring the smoldering activity of a burn does not require an additional authorization even if flames begin to spread within the authorized burn area due to ongoing smoldering.
- (d) A person who broadcast burns or pile burns in a manner that violates this subsection commits a misdemeanor of the second degree, punishable as provided in s. 775.082 or s. 775.083.
- (3) Certified prescribed burning; legislative findings and purpose.—
 - (a) The application of prescribed burning is a land management tool that benefits the safety of the public, the environment, and the economy of the state. The Legislature finds that:
 - Prescribed burning reduces vegetative fuels within wild land areas. Reduction of the fuel load reduces the risk and severity of wildfire, thereby reducing the threat of loss of life and property, particularly in urban areas.
 - Most of Florida's natural communities require periodic fire for maintenance of their ecological integrity. Prescribed burning is essential to the perpetuation, restoration, and management of many plant and animal communities. Significant loss of the state's biological diversity will occur if fire is excluded from fire-dependent systems.
 - 3. Forestland and rangeland constitute significant economic, biological, and aesthetic resources of statewide importance. Prescribed burning on forestland prepares sites for reforestation, removes undesirable competing vegetation, expedites nutrient cycling, and controls or eliminates certain forest pathogens. On rangeland, prescribed burning improves the quality and quantity of herbaceous vegetation necessary for livestock production.
 - 4. The state purchased hundreds of thousands of acres of land for parks, preserves, wildlife management areas, forests, and other public purposes. The use of prescribed burning for management of public lands is essential to maintain the specific resource values for which these lands were acquired.
 - 5. A public education program is necessary to make citizens and visitors aware of the public safety, resource, and economic benefits of prescribed burning.

- 6. Proper training in the use of prescribed burning is necessary to ensure maximum benefits and protection for the public.
- 7. As Florida's population continues to grow, pressures from liability issues and nuisance complaints inhibit the use of prescribed burning. Therefore, the Florida Forest Service is urged to maximize the opportunities for prescribed burning conducted during its daytime and nighttime authorization process.
- (b) Certified prescribed burning pertains only to broadcast burning for purposes of silviculture, wildland fire hazard reduction, wildlife management, ecological maintenance and restoration, and agriculture. It must be conducted in accordance with this subsection and:
 - May be accomplished only when a certified prescribed burn manager is present on site with a copy of the prescription and directly supervises the certified prescribed burn until the burn is completed, after which the certified prescribed burn manager is not required to be present.
 - 2. Requires that a written prescription be prepared before receiving authorization to burn from the Florida Forest Service.
 - a. A new prescription or authorization is not required for smoldering that occurs within the authorized burn area unless new ignitions are conducted by the certified prescribed burn manager.
 - b. Monitoring the smoldering activity of a certified prescribed burn does not require a prescription or an additional authorization even if flames begin to spread within the authorized burn area due to ongoing smoldering.
 - 3. Requires that the specific consent of the landowner or his or her designee be obtained before requesting an authorization.
 - 4. Requires that an authorization to burn be obtained from the Florida Forest Service before igniting the burn.
 - 5. Requires that there be adequate firebreaks at the burn site and sufficient personnel and firefighting equipment to contain the fire within the authorized burn area.
 - a. Fire spreading outside the authorized burn area on the day of the certified



prescribed burn ignition does not constitute conclusive proof of inadequate firebreaks, insufficient personnel, or a lack of firefighting equipment.

- b. If the certified prescribed burn is contained within the authorized burn area during the authorized period, a strong rebuttable presumption shall exist that adequate firebreaks, sufficient personnel, and sufficient firefighting equipment were present.
- c. Continued smoldering of a certified prescribed burn resulting in a subsequent wildfire does not by itself constitute evidence of gross negligence under this section.
- 6. Is considered to be in the public interest and does not constitute a public or private nuisance when conducted under applicable state air pollution statutes and rules.
- 7. Is considered to be a property right of the property owner if vegetative fuels are burned as required in this subsection.
- (c) A property owner or leaseholder or his or her agent, contractor, or legally authorized designee is not liable pursuant to s. 590.13 for damage or injury caused by the fire, including the reignition of a smoldering, previously contained burn, or resulting smoke or considered to be in violation of subsection (2) for burns conducted in accordance with this subsection, unless gross negligence is proven. The Florida Forest Service is not liable for burns for which it issues authorizations.
- (d) Any certified burner who violates this section commits a misdemeanor of the second degree, punishable as provided in s. 775.082 or s. 775.083.
- (e) The Florida Forest Service shall adopt rules for the use of prescribed burning and for certifying and decertifying certified prescribed burn managers based on their past experience, training, and record of compliance with this section.
- (4) Certified pile burning.-
 - (a) Certified pile burning pertains to the disposal of piled, naturally occurring debris from agricultural, silvicultural, land-clearing, or tree-cutting debris originating onsite. Certified pile burning must be conducted in accordance with the following:
 - 1. A certified pile burner must ensure, before ignition, that the piles are properly placed and

that the content of the piles is conducive to efficient burning.

- 2. A certified pile burner must ensure that the authorized burn is completed no later than 1 hour after sunset. If the burn is conducted in an area designated by the Florida Forest Service as smoke sensitive, a certified pile burner must ensure that the authorized burn is completed at least 1 hour before sunset.
- 3. A written pile burning plan must be prepared before receiving authorization from the Florida Forest Service to burn and must be onsite and available for inspection by a department representative.
- 4. The specific consent of the landowner or his or her agent must be obtained before requesting authorization to burn.
- 5. An authorization to burn must be obtained from the Florida Forest Service or its designated agent before igniting the burn.
- 6. There must be adequate firebreaks and sufficient personnel and firefighting equipment at the burn site to contain the burn to the piles authorized.
- (b) If a burn is conducted in accordance with paragraph (a), the property owner and his or her agent are not liable under s. 590.13 for damage or injury caused by the fire or resulting smoke, and are not in violation of subsection (2), unless gross negligence is proven.
- (c) A certified pile burner who violates this subsection commits a misdemeanor of the second degree, punishable as provided in s. 775.082 or s. 775.083.
- (d) The Florida Forest Service shall adopt rules regulating certified pile burning. The rules shall include procedures and criteria for certifying and decertifying certified pile burn managers based on past experience, training, and record of compliance with this section.
- (5) Wildfire hazard reduction treatment by the Florida Forest Service.— The Florida Forest Service may conduct fuel reduction initiatives, including, but not limited to, burning and mechanical and chemical treatment, on any area of wild land within the state which is reasonably determined to be in danger of wildfire in accordance with the following procedures:
 - (a) Describe the areas that will receive fuels treatment to the affected local governmental entity.

- (b) Publish a treatment notice, including a description of the area to be treated, in a conspicuous manner in at least one newspaper of general circulation in the area of the treatment not less than 10 days before the treatment.
- (c) Prepare and send a notice to all landowners in each area designated by the Florida Forest Service as a wildfire hazard area. The notice must describe particularly the area to be treated and the tentative date or dates of the treatment and must list the reasons for and the expected benefits from the wildfire hazard reduction.
- (d) Consider any landowner objections to the fuels treatment of his or her property. The landowner may apply to the director of the Florida Forest Service for a review of alternative methods of fuel reduction on the property. If the director or his or her designee does not resolve the landowner objection, the director shall convene a panel made up of the local forestry unit manager, the fire chief of the jurisdiction, and the affected county or city manager, or any of their designees. If the panel's recommendation is not acceptable to the landowner, the landowner may request further consideration by the Commissioner of Agriculture or his or her designee and shall thereafter be entitled to an administrative hearing pursuant to the provisions of chapter 120.
- (6) Florida Forest Service approval of local government open burning authorization programs.—
 - (a) A county or municipality may exercise the authority of the Florida Forest Service, if delegated by the Florida Forest Service under this subsection, to issue authorizations for the burning of yard trash or debris from land-clearing operations. A county's or municipality's existing or proposed open burning authorization program must:
 - Be approved by the Florida Forest Service. The Florida Forest Service may not approve a program if it fails to meet the requirements of subsections (2) and (4) and any rules adopted under those subsections.
 - Provide by ordinance or local law the requirements for obtaining and performing a burn authorization that complies with subsections (2) and (4) and any rules adopted under those subsections.
 - 3. Provide for the enforcement of the program's requirements.

- 4. Provide financial, personnel, and other resources needed to carry out the program.
- (b) If the Florida Forest Service determines that a county's or municipality's open burning authorization program does not comply with subsections (2) and (4) and any rules adopted under those subsections, the Florida Forest Service shall require the county or municipality to take necessary corrective actions within 90 days after receiving notice from the Florida Forest Service of its determination.
 - If the county or municipality fails to take the necessary corrective actions within the required period, the Florida Forest Service shall resume administration of the open burning authorization program in the county or municipality and the county or municipality shall cease administration of its program.
 - 2. Each county and municipality administering an open burning authorization program must cooperate with and assist the Florida Forest Service in carrying out the powers, duties, and functions of the Florida Forest Service.
 - A person who violates the requirements of a county's or municipality's open burning authorization program, as provided by ordinance or local law enacted pursuant to this subsection, commits a violation of this chapter, punishable as provided in s. 590.14.
- (7) Duties of agencies.—The Department of Education shall incorporate, where feasible and appropriate, the issues of fuels treatment, including prescribed burning, into its educational materials.

GEORGIA

- Ga. Code Ann. §12-6-148
 - (a) Prescribed burning conducted under the requirements of this part shall:
- Be accomplished only when an individual with previous prescribed burning experience or training is in charge of the burn and is present on site until the fire is adequately confined to reasonably prevent escape of the fire from the area intended to be burned;
- (2) Be considered in the public interest and shall not create a public or private nuisance;
- (3) Be considered a property right of the landowner; and

- (4) Be conducted in accordance with a permit issued under Part 3 of this article.
 - (b) No property owner or owner's agent conducting an authorized prescribed burn under this part shall be liable for damages or injury caused by fire or resulting smoke unless it is proven that there was gross negligence in starting, controlling, or completing the burn.

MICHIGAN

Mich. Comp. Laws Ann. § 324.51503b

Sec. 51503b. (1) Prescribed burning does not constitute a public or private nuisance when conducted in compliance with this part, part 55,1 and rules promulgated to implement this part or part 55.

- (2) Subject to subsections (3) and (4), a property owner or his or her agent conducting prescribed burning is not liable for damage or injury caused by the fire or resulting smoke.
- (3) Subsections (1) and (2) apply to a prescribed burn only if all of the following requirements are met:
 - (a) The landowner or his or her designee has specifically consented to the prescribed burn.
 - (b) The requirements of section 515032 are met.
 - (c) There are adequate firebreaks at the burn site and sufficient personnel and firefighting equipment for the control of the fire.
 - (d) A certified prescribed burn manager is present on site with a copy of the prescription, from ignition of the prescribed burn to its completion.
 - (e) The damage or injury does not result from the fire escaping the boundary of the area authorized in the permit under section 51503.
 - (f) The property owner or his or her agent is not grossly negligent.
- (4) Subsection (2) does not affect liability for injury to or death of a person engaged in the prescribed burning.

NEVADA

Nev. Rev. Stat. Ann. § 475.040

Every person who, with gross negligence, lights a fire for any purpose along the road through any woodland, or upon the same, or at any other place in the open, and thereby, or by any other means, sets fire to any growing timber or forest, shrubbery, crops, grass or vegetation, and thereby causes the destruction of any timber, forest, crops, grass, vegetation or property not his or her own, is guilty of a public offense, as prescribed in NRS 193.155, proportionate to the value of the loss resulting therefrom, in addition to being liable to the owner of such property for the full value thereof in a civil action.

Nev. Rev. Stat. Ann. § 527.126

- 1. The authority may authorize an agency of this state or any political subdivision of this state to commence a prescribed fire.
- 2. A prescribed fire must be conducted:
 - (a) Pursuant to a written plan which has been submitted to and authorized by the authority; and
 - (b) Under the direct supervision of at least one person who is qualified to oversee such fires and who remains on-site for the duration of the fire.
- A prescribed fire which is commenced pursuant to this section and which complies with laws relating to air pollution shall be deemed in the best interest of the public and not to constitute a public or private nuisance.
- 4. The State of Nevada, an agency of this state or any political subdivision or local government of this state, or any officer or employee thereof, is not liable for any damage or injury to property or persons, including death, which is caused by a prescribed fire that is authorized pursuant to this section, unless the fire was conducted in a grossly negligent manner.

SOUTH CAROLINA

Chapter 48-34

S.C. Code Ann. § 48-34-10

This chapter is known as the "South Carolina Prescribed Fire Act".

S.C. Code Ann. § 48-34-20

As used in this chapter:

 "Prescribed fire" means a controlled fire applied to forest, brush, or grassland vegetative fuels under specified environmental conditions and precautions which cause the fire to be confined to a predetermined area and allow accomplishment of the planned land management objectives. It also is known as "controlled burn".

- (2) "Certified prescribed fire manager" means an individual who successfully completes a certification program approved by the State Commission of Forestry.
- (3) "Prescribed fire plan" means a written prescription for starting and controlling a prescribed fire.
- S.C. Code Ann. § 48-34-30

The State Commission of Forestry shall promulgate regulations for the use of prescribed fire and for the certification of prescribed fire managers.

- S.C. Code Ann. § 48-34-40
- (A) For purposes of this section, "South Carolina Smoke Management Guidelines" means smoke management guidelines for vegetative debris burning for forestry, agriculture, and wildlife purposes that are promulgated as regulations by the State Forestry Commission pursuant to the Administrative Procedures Act.
- (B) Prescribed fires conducted pursuant to this chapter:
 - (1) must have a written prescribed fire plan that:
 - (a) complies with the South Carolina Smoke Management Guidelines;
 - (b) is prepared before authorization to burn is issued by the State Commission of Forestry; and
 - (c) is on site and followed during the burn;
- (2) must have present at least one certified prescribed fire manager who must:
 - (a) be certified by the commission;
 - (b) personally supervise the burn from ignition until the certified prescribed fire manager determines the burn to be safe;
 - (c) fully consider both fire behavior and related smoke management issues during and after the burn;

- (3) are considered in the public interest and do not constitute a public or private nuisance when conducted pursuant to the South Carolina Smoke Management Guidelines, Chapters 1 and 35, Title 48, and Chapter 2, Title 50; prescribed fires that are purposefully set in accordance with these chapters and the South Carolina Smoke Management Guidelines are exempt from the open fire prohibition pursuant to R. 61-62.2 and are acceptable to the Department of Health and Environmental Control if the fire is for:
 - (a) burning forest lands for specific management practices;
 - (b) agricultural control of diseases, weeds, and pests and for other specific agricultural purposes;
 - (c) open burning of trees, brush, grass, and other vegetable matter for game management purposes;
- (4) are considered a property right of the property owner.

S.C. Code Ann. § 48-34-50

A property owner or lessee or his agent or employee conducting a prescribed fire pursuant to this chapter is not liable for damage, injury, or loss caused by fire or other consequences of the prescribed fire, except for smoke, unless negligence is proven. A property owner or lessee or his agent or employee conducting a prescribed fire pursuant to this chapter is not liable for damage, injury, or loss caused by the resulting smoke of a prescribed fire unless gross negligence or recklessness is proven.

S.C. Code Ann. § 48-34-60

Notwithstanding the requirements of this chapter, a person may conduct a prescribed fire without a certified prescribed fire manager present.

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